Water Quality Treatment - Pond F

Project : Universal Studios Project 533
Orlando, Florida
P.N. : 06008049
By : Harris Civil Engineers, LLC
Date : 02/06/15

Drainage Basin I.D.	Drainage Area (ac)	Impervious Area (ac)		Pervious Area	Pond Area	Percent Impervious Excluding Roof & Pond Areas	One Inch Of Runoff From Entire Site (ac-ft)	2.5 Inches On Impervious Areas ** (ac-ft)
		Pavement	Roof	(ac)	(ac)			
Basin F	22.52	7.42	3.36	7.36	4.38	50.2%	1.88	1.55

Required Water Quality Volume = 1.88 ac-ft

** Calculation based upon the design examples provided in the SFWMD Environmental Resource Permit Information Manual, Volume IV.

Water Quality Treatment - Pond F1

Project : Universal Studios Project 533
Orlando, Florida
P.N. : 06008049
By : Harris Civil Engineers, LLC
Date : 02/06/15

Drainage Basin I.D.	Drainage Area (ac)	Impervious Area (ac)		Pervious Area (ac)	Pond Area (ac)	Percent Impervious Excluding Roof & Pond Areas	One Inch Of Runoff From Entire Site (ac-ft)	2.5 Inches On Impervious Areas ** (ac-ft)
		Pavement	Roof					
Saphire Falls	23.67	8.74	0.88	9.47	4.58	48.0%	1.97	1.91
Basin G2	41.06	23.90	7.16	10.00	0.00	70.5%	3.42	6.03
Basin G1	30.91	15.78	2.44	12.69	0.00	55.4%	2.58	3.57
Basin CSF2	8.47	5.10	2.60	0.77	0.00	86.9%	0.71	1.53
Total	104.11	53.52	13.08	32.93	4.58	61.9%	8.68	11.15

Required Water Quality Volume = 11.15 ac-ft

** Calculation based upon the design examples provided in the SFWMD Environmental Resource Permit Information Manual, Volume IV.

Water Quality Treatment - Pond F2

Project : Universal Studios Project 533
Orlando, Florida
P.N. : 06008049
By : Harris Civil Engineers, LLC
Date : 02/06/15

Drainage Basin I.D.	Drainage Area (ac)	Impervious Area (ac)		Pervious Area (ac)	Pond Area (ac)	Percent Impervious Excluding Roof & Pond Areas	One Inch Of Runoff From Entire Site (ac-ft)	2.5 Inches On Impervious Areas ** (ac-ft)
		Pavement	Roof					
Basin F2	9.05	3.90	0.57	3.78	0.80	50.8%	0.75	0.81

Required Water Quality Volume = 0.81 ac-ft

** Calculation based upon the design examples provided in the SFWMD Environmental Resource Permit Information Manual, Volume IV.

Stormwater Pond Stage/Area/Storage Relationships
And Weir Elevation Determination

Project : Universal Studios Project 533
Orlando, Florida
P.N. : 06008049
By : Harris Civil Engineers, LLC
Date : 02/06/15

POND H						
Stage (feet)	Depth (feet)	Surface Area (square feet)	Surface Area (acres)	Average Area (acres)	Incremental Volume (ac-Ft)	Total Volume (ac-Ft)
102.00	0.00	1,006,083	23.10	0.00	0.00	0.00
103.00	1.00	1,029,369	23.63	23.36	23.36	23.36
104.00	2.00	1,069,123	24.54	24.09	24.09	47.45
105.00	3.00	1,110,104	25.48	25.01	25.01	72.47
106.00	4.00	1,149,655	26.39	25.94	25.94	98.40
107.00	5.00	1,198,787	27.52	26.96	26.96	125.36

Required Water Quality Volume = 4.67 ac-ft

Depth to Weir = 0.30 ft
Control Elevation = 102.00 ft
Weir Elevation = 102.30 ft

Water Quality Volume Provided = 6.95 ac-ft

Stormwater Pond Stage/Area/Storage Relationships
And Weir Elevation Determination

Project : Universal Studios Project 533
Orlando, Florida
P.N. : 06008049
By : Harris Civil Engineers, LLC
Date : 02/06/15

POND F						
Stage (feet)	**Depth (feet)**	**Surface Area (square feet)**	**Surface Area (acres)**	**Average Area (acres)**	**Incremental Volume (ac-Ft)**	**Total Volume (ac-Ft)**
100.00	0.00	179,903	4.13	0.00	0.00	0.00
101.00	1.00	187,308	4.30	4.22	4.22	4.22
102.00	2.00	197,762	4.54	4.42	4.42	8.64
103.00	3.00	208,652	4.79	4.67	4.67	13.30
104.00	4.00	219,978	5.05	4.92	4.92	18.22
105.00	5.00	230,868	5.30	5.18	5.18	23.40
106.00	6.00	242,194	5.56	5.43	5.43	28.83
107.00	7.00	253,955	5.83	5.70	5.70	34.52
108.00	8.00	265,280	6.09	5.96	5.96	40.48

Required Water Quality Volume = 1.88 ac-ft

Depth to Weir = 0.50 ft
Control Elevation = 100.00 ft
Weir Elevation = 100.50 ft

Water Quality Volume Provided = 2.09 ac-ft

Stormwater Pond Stage/Area/Storage Relationships
And Weir Elevation Determination

Project : Universal Studios Project 533
Orlando, Florida
P.N. : 06008049
By : Harris Civil Engineers, LLC
Date : 02/06/15

POND F1						
Stage (feet)	**Depth (feet)**	**Surface Area (square feet)**	**Surface Area (acres)**	**Average Area (acres)**	**Incremental Volume (ac-Ft)**	**Total Volume (ac-Ft)**
104.00	0.00	199,505	4.58	0.00	0.00	0.00
105.00	1.00	206,474	4.74	4.66	4.66	4.66
106.00	2.00	213,880	4.91	4.83	4.83	9.49
107.00	3.00	220,849	5.07	4.99	4.99	14.48
108.00	4.00	228,254	5.24	5.16	5.16	19.63
109.00	5.00	235,660	5.41	5.33	5.33	24.96
110.00	6.00	243,065	5.58	5.50	5.50	30.45
111.00	7.00	250,470	5.75	5.67	5.67	36.12
112.00	8.00	257,440	5.91	5.83	5.83	41.95
113.00	9.00	264,845	6.08	6.00	6.00	47.94
114.00	10.00	271,814	6.24	6.00	17.99	54.10

Required Water Quality Volume = 11.15 ac-ft

Depth to Weir = 2.40 ft
Control Elevation = 104.00 ft
Weir Elevation = 106.40 ft

Water Quality Volume Provided = 11.46 ac-ft

Stormwater Pond Stage/Area/Storage Relationships
And Weir Elevation Determination

Project : Universal Studios Project 533
Orlando, Florida
P.N. : 06008049
By : Harris Civil Engineers, LLC
Date : 02/06/15

POND F2						
Stage (feet)	**Depth (feet)**	**Surface Area (square feet)**	**Surface Area (acres)**	**Average Area (acres)**	**Incremental Volume (ac-Ft)**	**Total Volume (ac-Ft)**
102.00	0.00	34,595	0.79	0.00	0.00	0.00
103.00	1.00	39,506	0.91	0.85	0.85	0.85
104.00	2.00	44,572	1.02	0.97	0.97	1.82
105.00	3.00	49,790	1.14	1.08	1.08	2.90
106.00	4.00	56,247	1.29	1.22	1.22	4.12
107.00	5.00	62,632	1.44	1.36	1.36	5.48
108.00	6.00	69,361	1.59	1.52	1.52	7.00

Required Water Quality Volume = 0.81 ac-ft

Depth to Weir = 1.00 ft
Control Elevation = 102.00 ft
Weir Elevation = 103.00 ft

Water Quality Volume Provided = 0.85 ac-ft

Drawdown Time Calculation

Project : *Universal Studios Project 533*
Orlando, Florida
P.N. : *06008049*
By : *Harris Civil Engineers, LLC*
Date : *02/06/15*

POND F						
Stage (feet)	***Depth (feet)***	***Surface Area (square feet)***	***Surface Area (acres)***	***Average Area (acres)***	***Incremental Volume (ac-Ft)***	***Total Volume (ac-Ft)***
100.00	*0.00*	*179,903*	*4.13*	*0.00*	*0.00*	*0.00*
101.00	*1.00*	*187,308*	*4.30*	*4.22*	*4.22*	*4.22*
102.00	*2.00*	*197,762*	*4.54*	*4.42*	*4.42*	*8.64*
103.00	*3.00*	*208,652*	*4.79*	*4.67*	*4.67*	*13.30*
104.00	*4.00*	*219,978*	*5.05*	*4.92*	*4.92*	*18.22*
105.00	*5.00*	*230,868*	*5.30*	*5.18*	*5.18*	*23.40*

Water Quality Volume Provided = *2.09* *ac-ft*
Drawdown Volume (1/2" over basin) = ***0.94*** ***ac-ft***
Remaining Water Quality Volume = *1.15* *ac-ft*

Depth of Remaining Volume = *0.28* *ft*
Orifice Invert = *100.00* *ft*
Drawdown Level = *100.28* *ft*

Approximate Groundwater Seepage Rate = *0* *gpd/ lf*
Pond Perimeter @ Normal Water Line = *0* *ft*
Groundwater Inflow = *158,983* *gpd*
Groundwater Inflow = ***0.488*** ***ac-ft/day***

Inflow from Upstream (Pond F1)= *0.185* *ac-ft/hr*
Inflow from Upstream (Pond F1)= ***4.430*** ***ac-ft/day***

FALLING HEAD EQUATION:

$$t = \{2 * V * 43560\} / \{C * A_o * (2*g)^{0.5} * (h_1^{0.5} + h_2^{0.5})\}$$

where:

t = *drawdown time (sec)*
A_o = *Orifice area (s.f.)*
C = *Orifice coefficient*
V = *Pond volume to be drawn down (ac-ft)*
h_1 = *Initial height above orifice centerline (ft)*
h_2 = *Final height above orifice centerline (ft)*

Initial Elevation = ***100.50*** ***ft***
Final Elevation = ***100.28*** ***ft***
Total Drawdown Volume = ***5.92*** ***ac-ft***
Number of Bleeddowns = ***8***
Orifice Coefficient = ***0.6***
Orifice Diameter = ***5*** ***in***

Drawdown Time = ***33.8*** ***hrs***

Drawdown Time Calculation

Project : Universal Studios Project 533
Orlando, Florida
P.N. : 06008049
By : Harris Civil Engineers, LLC
Date : 02/06/15

POND F1						
Stage (feet)	Depth (feet)	Surface Area (square feet)	Surface Area (acres)	Average Area (acres)	Incremental Volume (ac-Ft)	Total Volume (ac-Ft)
104.00	0.00	199,505	4.58	0.00	0.00	0.00
105.00	1.00	206,474	4.74	4.66	4.66	4.66
106.00	2.00	213,880	4.91	4.83	4.83	9.49
107.00	3.00	220,849	5.07	4.99	4.99	14.48
108.00	4.00	228,254	5.24	5.16	5.16	19.63
109.00	5.00	235,660	5.41	5.33	5.33	24.96

Water Quality Volume Provided = 11.46 ac-ft
Drawdown Volume (1/2" over basin) = 4.34 ac-ft
Remaining Water Quality Volume = 7.12 ac-ft

Depth of Remaining Volume = 1.52 ft
Orifice Invert = 104.00 ft
Drawdown Level = 105.52 ft

Approximate Groundwater Seepage Rate = 0 gpd/ lf
Pond Perimeter @ Normal Water Line = 0 ft
Groundwater Inflow = 84,015 gpd
Groundwater Inflow = 0.258 ac-ft/day

Approximate Underdrain Flowrate = 0 gpd
Approximate Underdrain Flowrate = 0.000 ac-ft/day

FALLING HEAD EQUATION:

$$t = \{2 * V * 43560\} / \{C * A_o * (2*g)^{0.5} * (h_1^{0.5} + h_2^{0.5})\}$$

where:

t = drawdown time (sec)
A_o = Orifice area (s.f.)
C = Orifice coefficient
V = Pond volume to be drawn down (ac-ft)
h_1 = Initial height above orifice centerline (ft)
h_2 = Final height above orifice centerline (ft)

Initial Elevation = 106.40 ft
Final Elevation = 105.52 ft
Total Drawdown Volume = 4.34 ac-ft
Number of Bleeddowns = 4
Orifice Coefficient = 0.6
Orifice Diameter = 4 in

Drawdown Time = 23.5 hrs

Drawdown Time Calculation

Project : Universal Studios Project 533
Orlando, Florida
P.N. : 06008049
By : Harris Civil Engineers, LLC
Date : 02/06/15

POND F2						
Stage (feet)	**Depth (feet)**	**Surface Area (square feet)**	**Surface Area (acres)**	**Average Area (acres)**	**Incremental Volume (ac-Ft)**	**Total Volume (ac-Ft)**
102.00	0.00	34,595	0.79	0.00	0.00	0.00
103.00	1.00	39,506	0.91	0.85	0.85	0.85
104.00	2.00	44,572	1.02	0.97	0.97	1.82
105.00	3.00	49,790	1.14	1.08	1.08	2.90
106.00	4.00	56,247	1.29	1.22	1.22	4.12
107.00	5.00	62,632	1.44	1.36	1.36	5.48

Water Quality Volume Provided = 0.85 ac-ft
Drawdown Volume (1/2" over basin) = 0.38 ac-ft
Remaining Water Quality Volume = 0.47 ac-ft

Depth of Remaining Volume = 0.57 ft
Orifice Invert = 102.00 ft
Drawdown Level = 102.57 ft

Approximate Groundwater Seepage Rate = 0 gpd/ lf
Pond Perimeter @ Normal Water Line = 0 ft
Groundwater Inflow = 0 gpd
Groundwater Inflow = 0.000 ac-ft/day

Approximate Underdrain Flowrate = 0 gpd
Approximate Underdrain Flowrate = 0.000 ac-ft/day

FALLING HEAD EQUATION:

$$t = \{2 * V * 43560\} / \{C * A_o * (2*g)^{0.5} * (h_1^{0.5} + h_2^{0.5})\}$$

where:

t = drawdown time (sec)
A_o = Orifice area (s.f.)
C = Orifice coefficient
V = Pond volume to be drawn down (ac-ft)
h_1 = Initial height above orifice centerline (ft)
h_2 = Final height above orifice centerline (ft)

Initial Elevation = 103.00 ft
Final Elevation = 102.57 ft
Total Drawdown Volume = 0.38 ac-ft
Number of Bleeddowns = 1
Orifice Coefficient = 0.6
Orifice Diameter = 3 in Minimum size orifice used

Drawdown Time = 24.1 hrs

```
==========================================================================================
==== Basins ==============================================================================
==========================================================================================

         Name: 10A                     Node: US22                  Status: Onsite
        Group: UNIV                    Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                   Peaking Factor: 484.0
          Rainfall File:                    Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                Time of Conc(min): 56.80
               Area(ac): 13.300                 Time Shift(hrs): 0.00
           Curve Number: 84.70             Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE:  UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

----------------------------------------------------------------------------------------------------
         Name: 10B                     Node: US23                  Status: Onsite
        Group: UNIV                    Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                   Peaking Factor: 484.0
          Rainfall File:                    Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                Time of Conc(min): 29.20
               Area(ac): 5.300                  Time Shift(hrs): 0.00
           Curve Number: 88.90             Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE:  UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

----------------------------------------------------------------------------------------------------
         Name: 10C                     Node: DS23                  Status: Onsite
        Group: UNIV                    Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                   Peaking Factor: 484.0
          Rainfall File:                    Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                Time of Conc(min): 25.70
               Area(ac): 3.470                  Time Shift(hrs): 0.00
           Curve Number: 89.60             Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE:  UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

----------------------------------------------------------------------------------------------------
         Name: 10D                     Node: US30-32               Status: Onsite
        Group: UNIV                    Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                   Peaking Factor: 484.0
          Rainfall File:                    Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                Time of Conc(min): 37.00
               Area(ac): 6.250                  Time Shift(hrs): 0.00
           Curve Number: 88.90             Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE:  UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

----------------------------------------------------------------------------------------------------
         Name: 10E                     Node: US26                  Status: Onsite
        Group: UNIV                    Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                   Peaking Factor: 484.0
          Rainfall File:                    Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                Time of Conc(min): 34.40
               Area(ac): 13.360                 Time Shift(hrs): 0.00
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```
           Curve Number: 89.40             Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE:  UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

----------------------------------------------------------------------------------------------------
         Name: 10F                       Node: US31                    Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                     Peaking Factor: 484.0
          Rainfall File:                      Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                  Time of Conc(min): 34.30
               Area(ac): 12.910                   Time Shift(hrs): 0.00
           Curve Number: 88.30             Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE:  UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

----------------------------------------------------------------------------------------------------
         Name: 10G                       Node: US29                    Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                     Peaking Factor: 484.0
          Rainfall File:                      Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                  Time of Conc(min): 39.80
               Area(ac): 7.460                    Time Shift(hrs): 0.00
           Curve Number: 88.60             Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE:  UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

----------------------------------------------------------------------------------------------------
         Name: 10H                       Node: DS30-32                 Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                     Peaking Factor: 484.0
          Rainfall File:                      Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                  Time of Conc(min): 17.80
               Area(ac): 4.557                    Time Shift(hrs): 0.00
           Curve Number: 94.70             Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)
***************************
BASIN AREA, CURVE NUMBER, AND TIME OF CONCENTRATION
REVISED BY INWOOD

----------------------------------------------------------------------------------------------------
         Name: 10I                       Node: DS29                    Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                     Peaking Factor: 484.0
          Rainfall File:                      Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                  Time of Conc(min): 47.00
               Area(ac): 5.700                    Time Shift(hrs): 0.00
           Curve Number: 87.70             Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)
***************************
BASIN AREA, CURVE NUMBER, AND TIME OF CONCENTRATION
REVISED BY INWOOD

----------------------------------------------------------------------------------------------------
         Name: 10J                       Node: US35-36                 Status: Onsite
```

```
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                     Peaking Factor: 484.0
          Rainfall File:                      Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                  Time of Conc(min): 48.90
               Area(ac): 2.845                   Time Shift(hrs): 0.00
           Curve Number: 90.60              Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)
***************************
BASIN AREA, CURVE NUMBER, AND TIME OF CONCENTRATION
REVISED BY INWOOD

----------------------------------------------------------------------------------------------------
         Name: 200                       Node: 200                     Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                     Peaking Factor: 484.0
          Rainfall File:                      Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                  Time of Conc(min): 28.30
               Area(ac): 13.240                  Time Shift(hrs): 0.00
           Curve Number: 91.50              Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE:  UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.


----------------------------------------------------------------------------------------------------
         Name: 20A                       Node: DS15                    Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                     Peaking Factor: 484.0
          Rainfall File:                      Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                  Time of Conc(min): 29.40
               Area(ac): 12.650                  Time Shift(hrs): 0.00
           Curve Number: 87.40              Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE:  UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

----------------------------------------------------------------------------------------------------
         Name: 20B                       Node: US15                    Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                     Peaking Factor: 484.0
          Rainfall File:                      Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                  Time of Conc(min): 26.40
               Area(ac): 10.080                  Time Shift(hrs): 0.00
           Curve Number: 81.30              Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE:  UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

----------------------------------------------------------------------------------------------------
         Name: 20C                       Node: US18                    Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                     Peaking Factor: 484.0
          Rainfall File:                      Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                  Time of Conc(min): 54.30
               Area(ac): 3.490                   Time Shift(hrs): 0.00
           Curve Number: 84.80              Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
```

STORMWATER SYSTEM MODEL (8/26/99)

NOTE: UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

```
-----------------------------------------------------------------------------------------------------
         Name: 20D                      Node: US16                     Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                    Peaking Factor: 484.0
          Rainfall File:                     Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                 Time of Conc(min): 10.00
               Area(ac): 0.710                   Time Shift(hrs): 0.00
           Curve Number: 79.00              Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

```
-----------------------------------------------------------------------------------------------------
         Name: 20E                      Node: DS17                     Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                    Peaking Factor: 484.0
          Rainfall File:                     Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                 Time of Conc(min): 10.00
               Area(ac): 1.690                   Time Shift(hrs): 0.00
           Curve Number: 80.50              Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

```
-----------------------------------------------------------------------------------------------------
         Name: 20G                      Node: US20                     Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                    Peaking Factor: 484.0
          Rainfall File:                     Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                 Time of Conc(min): 69.10
               Area(ac): 9.930                   Time Shift(hrs): 0.00
           Curve Number: 88.10              Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

```
-----------------------------------------------------------------------------------------------------
         Name: 20H                      Node: US21                     Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                    Peaking Factor: 484.0
          Rainfall File:                     Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                 Time of Conc(min): 17.00
               Area(ac): 10.840                  Time Shift(hrs): 0.00
           Curve Number: 87.50              Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

```
-----------------------------------------------------------------------------------------------------
         Name: 20I                      Node: DS21                     Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                    Peaking Factor: 484.0
          Rainfall File:                     Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                 Time of Conc(min): 24.10
               Area(ac): 3.070                   Time Shift(hrs): 0.00
```

```
          Curve Number: 88.70             Max Allowable Q(cfs): 999999.000
               DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE:  UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

----------------------------------------------------------------------------------------------------
         Name: 20J                       Node: DS27                    Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                     Peaking Factor: 484.0
          Rainfall File:                      Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                  Time of Conc(min): 15.50
               Area(ac): 4.690                    Time Shift(hrs): 0.00
           Curve Number: 87.60            Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE:  UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

----------------------------------------------------------------------------------------------------
         Name: 20K                       Node: US27                    Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                     Peaking Factor: 484.0
          Rainfall File:                      Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                  Time of Conc(min): 15.90
               Area(ac): 5.670                    Time Shift(hrs): 0.00
           Curve Number: 88.80            Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE:  UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

----------------------------------------------------------------------------------------------------
         Name: 20L                       Node: US33                    Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                     Peaking Factor: 484.0
          Rainfall File:                      Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                  Time of Conc(min): 28.20
               Area(ac): 13.710                   Time Shift(hrs): 0.00
           Curve Number: 87.20            Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE:  UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

----------------------------------------------------------------------------------------------------
         Name: 20M                       Node: DS34                    Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                     Peaking Factor: 484.0
          Rainfall File:                      Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                  Time of Conc(min): 17.80
               Area(ac): 6.286                    Time Shift(hrs): 0.00
           Curve Number: 91.60            Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE:  UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

----------------------------------------------------------------------------------------------------
         Name: 300                       Node: 300                     Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN
```

```
        Unit Hydrograph: UH484                  Peaking Factor: 484.0
          Rainfall File:                   Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000               Time of Conc(min): 18.70
              Area(ac): 5.270                  Time Shift(hrs): 0.00
           Curve Number: 93.30            Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

```
----------------------------------------------------------------------------------------------------
         Name: 400                     Node: 400                     Status: Onsite
        Group: UNIV                    Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                  Peaking Factor: 484.0
          Rainfall File:                   Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000               Time of Conc(min): 10.70
              Area(ac): 3.760                  Time Shift(hrs): 0.00
           Curve Number: 94.20            Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

```
----------------------------------------------------------------------------------------------------
         Name: 500                     Node: 500                     Status: Onsite
        Group: UNIV                    Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                  Peaking Factor: 484.0
          Rainfall File:                   Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000               Time of Conc(min): 23.60
              Area(ac): 18.550                 Time Shift(hrs): 0.00
           Curve Number: 94.50            Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

```
----------------------------------------------------------------------------------------------------
         Name: A                       Node: POND-A                  Status: Onsite
        Group: UNIV                    Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                  Peaking Factor: 484.0
          Rainfall File:                   Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000               Time of Conc(min): 30.00
              Area(ac): 74.020                 Time Shift(hrs): 0.00
           Curve Number: 94.60            Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
----------------------------------------------------------------------------------------------------
         Name: AMERWAY                 Node: US20                    Status: Onsite
        Group: UNIV                    Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                  Peaking Factor: 484.0
          Rainfall File:                   Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000               Time of Conc(min): 61.60
              Area(ac): 31.189                 Time Shift(hrs): 0.00
           Curve Number: 94.60            Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

AMERICAN WAY BASIN

```
----------------------------------------------------------------------------------------------------
         Name: AW3                          Node: US20                         Status: Onsite
        Group: UNIV                         Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                       Peaking Factor: 484.0
          Rainfall File:                         Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                     Time of Conc(min): 19.90
               Area(ac): 2.000                       Time Shift(hrs): 0.00
           Curve Number: 94.20                 Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

```
----------------------------------------------------------------------------------------------------
         Name: AW_HOTEL                     Node: AW_HOTEL                     Status: Onsite
        Group: UNIV                         Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                       Peaking Factor: 484.0
          Rainfall File:                         Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                     Time of Conc(min): 10.00
               Area(ac): 2.266                       Time Shift(hrs): 0.00
           Curve Number: 95.10                 Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

HOTEL LOCATED ALONG AMERICAN WAY.

```
----------------------------------------------------------------------------------------------------
         Name: B                            Node: POND-B                       Status: Onsite
        Group: UNIV                         Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                       Peaking Factor: 484.0
          Rainfall File:                         Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                     Time of Conc(min): 15.00
               Area(ac): 69.400                      Time Shift(hrs): 0.00
           Curve Number: 97.00                 Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
----------------------------------------------------------------------------------------------------
         Name: C1                           Node: POND-C                       Status: Onsite
        Group: UNIV                         Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                       Peaking Factor: 484.0
          Rainfall File:                         Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                     Time of Conc(min): 25.00
               Area(ac): 29.460                      Time Shift(hrs): 0.00
           Curve Number: 92.80                 Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
----------------------------------------------------------------------------------------------------
         Name: C2                           Node: DCS-2                        Status: Onsite
        Group: UNIV                         Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                       Peaking Factor: 484.0
          Rainfall File:                         Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                     Time of Conc(min): 25.00
               Area(ac): 20.730                      Time Shift(hrs): 0.00
           Curve Number: 93.30                 Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
         Name: C3                        Node: POND-C                Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                     Peaking Factor: 484.0
          Rainfall File:                      Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                  Time of Conc(min): 25.00
               Area(ac): 15.460                   Time Shift(hrs): 0.00
           Curve Number: 97.10              Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
         Name: CSF2                      Node: D260                  Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: Uh484                     Peaking Factor: 484.0
          Rainfall File:                      Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                  Time of Conc(min): 10.00
               Area(ac): 8.470                    Time Shift(hrs): 0.00
           Curve Number: 97.00              Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

```
         Name: D                         Node: POND-D                Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                     Peaking Factor: 484.0
          Rainfall File:                      Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                  Time of Conc(min): 25.00
               Area(ac): 48.870                   Time Shift(hrs): 0.00
           Curve Number: 95.10              Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
         Name: D2                        Node: POND-D2               Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                     Peaking Factor: 484.0
          Rainfall File:                      Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                  Time of Conc(min): 10.00
               Area(ac): 1.820                    Time Shift(hrs): 0.00
           Curve Number: 88.50              Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
         Name: D3                        Node: POND-D3               Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN
```

```
        Unit Hydrograph: UH484                 Peaking Factor: 484.0
          Rainfall File:                  Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000              Time of Conc(min): 10.00
               Area(ac): 2.600                Time Shift(hrs): 0.00
           Curve Number: 91.50           Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
----------------------------------------------------------------------------------------------------
         Name: D4                       Node: NODE-D4                Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                 Peaking Factor: 484.0
          Rainfall File:                  Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000              Time of Conc(min): 15.00
               Area(ac): 18.110               Time Shift(hrs): 0.00
           Curve Number: 97.10           Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
----------------------------------------------------------------------------------------------------
         Name: D5                       Node: OVERFLOW               Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                 Peaking Factor: 484.0
          Rainfall File:                  Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000              Time of Conc(min): 10.00
               Area(ac): 2.330                Time Shift(hrs): 0.00
           Curve Number: 80.00           Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
----------------------------------------------------------------------------------------------------
         Name: D6                       Node: NODE-D6                Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                 Peaking Factor: 484.0
          Rainfall File:                  Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000              Time of Conc(min): 20.00
               Area(ac): 24.210               Time Shift(hrs): 0.00
           Curve Number: 95.50           Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
----------------------------------------------------------------------------------------------------
         Name: DOT-1                    Node: DOT-1                  Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                 Peaking Factor: 484.0
          Rainfall File:                  Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000              Time of Conc(min): 45.00
```

```
              Area(ac): 3.080                 Time Shift(hrs): 0.00
          Curve Number: 91.00            Max Allowable Q(cfs): 999999.000
               DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
----------------------------------------------------------------------------------------------------
         Name: DOT-2                     Node: DOT-2                  Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                    Peaking Factor: 484.0
          Rainfall File:                     Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                 Time of Conc(min): 10.00
              Area(ac): 1.230                   Time Shift(hrs): 0.00
          Curve Number: 91.00            Max Allowable Q(cfs): 999999.000
               DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
----------------------------------------------------------------------------------------------------
         Name: DOT-3                     Node: DOT-3                  Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                    Peaking Factor: 484.0
          Rainfall File:                     Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                 Time of Conc(min): 10.00
              Area(ac): 1.190                   Time Shift(hrs): 0.00
          Curve Number: 84.50            Max Allowable Q(cfs): 999999.000
               DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
----------------------------------------------------------------------------------------------------
         Name: E1                        Node: POND-E1                Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                    Peaking Factor: 484.0
          Rainfall File:                     Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                 Time of Conc(min): 15.00
              Area(ac): 7.730                   Time Shift(hrs): 0.00
          Curve Number: 97.40            Max Allowable Q(cfs): 999999.000
               DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
----------------------------------------------------------------------------------------------------
         Name: E2                        Node: POND-E2                Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                    Peaking Factor: 484.0
          Rainfall File:                     Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                 Time of Conc(min): 15.00
              Area(ac): 22.000                  Time Shift(hrs): 0.00
          Curve Number: 97.20            Max Allowable Q(cfs): 999999.000
               DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
----------------------------------------------------------------------------------------------------
         Name: F                        Node: POND-F                 Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                    Peaking Factor: 484.0
          Rainfall File:                     Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                 Time of Conc(min): 10.00
               Area(ac): 22.520                  Time Shift(hrs): 0.00
           Curve Number: 93.00               Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

SOUTHERN PORTION OF THE ROYAL PACIFIC HOTEL SITE

```
----------------------------------------------------------------------------------------------------
         Name: F1                       Node: POND-F1                Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                    Peaking Factor: 484.0
          Rainfall File:                     Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                 Time of Conc(min): 15.00
               Area(ac): 23.670                  Time Shift(hrs): 0.00
           Curve Number: 92.00               Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

HOTEL "D" SITE DRAINING TO POND 'F1'

```
----------------------------------------------------------------------------------------------------
         Name: F2                       Node: POND-F2                Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: Uh484                    Peaking Factor: 484.0
          Rainfall File:                     Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                 Time of Conc(min): 10.00
               Area(ac): 9.050                   Time Shift(hrs): 0.00
           Curve Number: 91.00               Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

```
----------------------------------------------------------------------------------------------------
         Name: G1                       Node: NODE-G1                Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: Uh484                    Peaking Factor: 484.0
          Rainfall File:                     Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                 Time of Conc(min): 15.00
               Area(ac): 30.910                  Time Shift(hrs): 0.00
           Curve Number: 87.00               Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

```
----------------------------------------------------------------------------------------------------
         Name: G2                       Node: NODE-G2                Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                    Peaking Factor: 484.0
          Rainfall File:                     Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                 Time of Conc(min): 15.00
               Area(ac): 41.060                  Time Shift(hrs): 0.00
           Curve Number: 93.00               Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

Cabana Bay Hotel Site

```
----------------------------------------------------------------------------------------------------
         Name: H                        Node: POND-H                 Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN
```

```
        Unit Hydrograph: UH484                   Peaking Factor: 484.0
          Rainfall File:                    Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                Time of Conc(min): 10.00
               Area(ac): 56.070                 Time Shift(hrs): 0.00
           Curve Number: 97.00             Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
----------------------------------------------------------------------------------------------------
         Name: H1                        Node: POND-H1               Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                   Peaking Factor: 484.0
          Rainfall File:                    Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                Time of Conc(min): 10.00
               Area(ac): 10.800                 Time Shift(hrs): 0.00
           Curve Number: 96.00             Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

NORTHERN PORTION OF THE ROYAL PACIFIC HOTEL SITE

```
----------------------------------------------------------------------------------------------------
         Name: HILTON_B10                Node: HILTON_SN10           Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                   Peaking Factor: 484.0
          Rainfall File:                    Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                Time of Conc(min): 10.00
               Area(ac): 1.821                  Time Shift(hrs): 0.00
           Curve Number: 92.70             Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM AMERICAN WAY HILTON PERMIT
MODEL (5-11-01).

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
----------------------------------------------------------------------------------------------------
         Name: HILTON_NB10               Node: HILTON_N10            Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                   Peaking Factor: 484.0
          Rainfall File:                    Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                Time of Conc(min): 10.00
               Area(ac): 6.731                  Time Shift(hrs): 0.00
           Curve Number: 93.60             Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM AMERICAN WAY HILTON PERMIT
MODEL (5-11-01).

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
----------------------------------------------------------------------------------------------------
         Name: I                         Node: POND-I                Status: Onsite
        Group: UNIV                      Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                   Peaking Factor: 484.0
          Rainfall File:                    Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                Time of Conc(min): 10.00
               Area(ac): 17.020                 Time Shift(hrs): 0.00
           Curve Number: 99.10             Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
         Name: IOA                      Node: IOA                    Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                    Peaking Factor: 484.0
          Rainfall File:                     Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                 Time of Conc(min): 40.00
               Area(ac): 100.520                 Time Shift(hrs): 0.00
           Curve Number: 94.00              Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
         Name: MOTEL6                   Node: MOTEL6_POND1           Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                    Peaking Factor: 484.0
          Rainfall File:                     Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                 Time of Conc(min): 10.00
               Area(ac): 3.720                   Time Shift(hrs): 0.00
           Curve Number: 92.00              Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM MOTEL 6 PERMIT
MODEL (2001).

```
         Name: NPG                      Node: DCS-3                  Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                    Peaking Factor: 484.0
          Rainfall File:                     Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                 Time of Conc(min): 15.00
               Area(ac): 25.070                  Time Shift(hrs): 0.00
           Curve Number: 95.10              Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
         Name: SPG                      Node: SPG                    Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                    Peaking Factor: 484.0
          Rainfall File:                     Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000                 Time of Conc(min): 15.00
               Area(ac): 19.870                  Time Shift(hrs): 0.00
           Curve Number: 92.70              Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: BASIN TYPE CHANGED BY INWOOD FROM SANTA BARBARA TO SCS UNIT HYDROGRAPH
TO BE CONSISTENT WITH THE REST OF THE MODEL. PEAKING FACTOR OF 484 CHOSEN TO BE
CONSISTENT WITH REST OF MODEL.

```
         Name: SUPER8                   Node: SUPER8_POND            Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN
```

```
        Unit Hydrograph: UH484                  Peaking Factor: 484.0
          Rainfall File:                   Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000               Time of Conc(min): 10.00
               Area(ac): 3.984                 Time Shift(hrs): 0.00
           Curve Number: 91.80           Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

SUPER 8 MOTEL BASIN

```
----------------------------------------------------------------------------------------------------
         Name: V-CIRCLE                 Node: US16                    Status: Onsite
        Group: UNIV                     Type: SCS Unit Hydrograph CN

        Unit Hydrograph: UH484                  Peaking Factor: 484.0
          Rainfall File:                   Storm Duration(hrs): 0.00
    Rainfall Amount(in): 0.000               Time of Conc(min): 16.00
               Area(ac): 11.480                Time Shift(hrs): 0.00
           Curve Number: 94.00           Max Allowable Q(cfs): 999999.000
                DCIA(%): 0.00
```

BASIN DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL (8/26/99)

NOTE: UNIT HYDROGRAPH PEAKING FACTOR INCREASED TO 484 TO BE CONSISTENT WITH THE REST OF THE MODEL.

```
==========================================================================================
==== Nodes ===============================================================================
==========================================================================================

      Name: 200                Base Flow(cfs): 0.000          Init Stage(ft): 108.000
     Group: UNIV                                              Warn Stage(ft): 113.500
      Type: Stage/Area
```

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 POND 200 (FROM GREINER CALCS)

Stage(ft)	Area(ac)
100.000	0.3000
106.000	0.5800
108.000	0.7400
112.500	1.1300
113.500	1.5200

```
------------------------------------------------------------------------------------------
      Name: 200-OUT            Base Flow(cfs): 0.000          Init Stage(ft): 107.300
     Group: UNIV                                              Warn Stage(ft): 115.000
      Type: Stage/Area
```

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 POND 200 OUTFALL (FROM GREINER CALCS)

Stage(ft)	Area(ac)
107.300	0.1000
115.000	0.1000

```
------------------------------------------------------------------------------------------
      Name: 300                Base Flow(cfs): 0.000          Init Stage(ft): 96.500
     Group: UNIV                                              Warn Stage(ft): 102.000
      Type: Stage/Area
```

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 POND 300 (FROM GREINER CALCS)

NOTE: STAGE AREA MODIFIED BY INWOOD BASED ON SFWMD 1' CONTOURS, 2002

Stage(ft)	Area(ac)

88.500	0.0600
94.500	0.2100
96.500	0.3000
100.000	0.6700
101.000	0.9250
102.000	1.0556
103.000	1.1514

Name: 400 Base Flow(cfs): 0.000 Init Stage(ft): 96.500
Group: UNIV Warn Stage(ft): 103.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 POND 400 (FROM GREINER CALCS)

Stage(ft)	Area(ac)
88.500	0.0500
94.500	0.1800
96.500	0.2700
98.000	0.5620
99.000	0.6773
100.000	0.8213
101.000	1.1116
102.000	1.2497
103.000	1.4000

Name: 500 Base Flow(cfs): 0.000 Init Stage(ft): 97.750
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 POND 500 (FROM GREINER CALCS)

Stage(ft)	Area(ac)
97.550	0.0010
97.750	1.4800
98.000	1.5000
99.000	1.5700
100.000	1.6500
101.000	1.7200
102.000	1.8000
103.000	1.8900
104.000	1.9700
105.000	2.1600

Name: AW_HOTEL Base Flow(cfs): 0.000 Init Stage(ft): 101.000
Group: UNIV Warn Stage(ft): 104.000
Type: Stage/Area

DESCRIPTION: DETENTION POND
LOCATION: HOTEL ON SOUTH SIDE OF AMERICAN WAY
INITIAL STAGE: ASSUMED FROM CONTOURS
WARNING STAGE: POND TOP OF BANK
DATA SOURCES: SFWMD DIGITAL 1' CONTOURS, 2002; USGS AERIAL 2002

Stage(ft)	Area(ac)
101.000	0.0200
102.000	0.0500
103.000	0.0700
104.000	0.2400
105.000	0.2772

Name: D260 Base Flow(cfs): 0.000 Init Stage(ft): 133.360
Group: UNIV Warn Stage(ft): 141.000

```
      Type: Stage/Area


      Stage(ft)        Area(ac)
--------------- ---------------
        133.360          0.0006
        141.000          0.0006

-----------------------------------------------------------------------------------------
      Name: DCS-1              Base Flow(cfs): 0.000          Init Stage(ft): 96.000
     Group: UNIV                                              Warn Stage(ft): 104.000
      Type: Stage/Area

DRAINAGE CONTROL STRUCTURE 1

      Stage(ft)        Area(ac)
--------------- ---------------
         88.000          0.1000
        104.000          0.1000

-----------------------------------------------------------------------------------------
      Name: DCS-2              Base Flow(cfs): 0.000          Init Stage(ft): 96.000
     Group: UNIV                                              Warn Stage(ft): 111.500
      Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
DRAINAGE CONTROL STRUCTURE 2

      Stage(ft)        Area(ac)
--------------- ---------------
         83.750          0.1000
        111.500          0.1000

-----------------------------------------------------------------------------------------
      Name: DCS-3              Base Flow(cfs): 0.000          Init Stage(ft): 96.000
     Group: UNIV                                              Warn Stage(ft): 107.890
      Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
DRAINAGE CONTROL STRUCTURE 3

      Stage(ft)        Area(ac)
--------------- ---------------
         85.300          0.1000
        107.930          0.1000

-----------------------------------------------------------------------------------------
      Name: DCS-3A             Base Flow(cfs): 0.000          Init Stage(ft): 96.000
     Group: UNIV                                              Warn Stage(ft): 106.000
      Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
DRAINAGE CONTROL STRUCTURE 3A

      Stage(ft)        Area(ac)
--------------- ---------------
         94.850          0.1000
        106.190          0.1000

-----------------------------------------------------------------------------------------
      Name: DCS-7              Base Flow(cfs): 0.000          Init Stage(ft): 94.330
     Group: UNIV                                              Warn Stage(ft): 104.000
      Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
DRAINAGE CONTROL STRUCTURE 7
```

Stage(ft)	Area(ac)
83.290	0.5000
104.000	0.5000

Name: DMH-33   Base Flow(cfs): 0.000   Init Stage(ft): 94.330
Group: UNIV   Warn Stage(ft): 104.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
MANHOLE DMH#33 (JUNCTION BOX AT SE CORNER OF NPG)

Stage(ft)	Area(ac)
83.600	0.1000
103.000	0.1000

Name: DOT-1   Base Flow(cfs): 0.000   Init Stage(ft): 95.600
Group: UNIV   Warn Stage(ft): 100.200
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
WEST SIDE OF KIRKMAN RD TO INLET KR-1

Stage(ft)	Area(ac)
95.600	0.1000
100.200	0.1000

Name: DOT-2   Base Flow(cfs): 0.000   Init Stage(ft): 95.000
Group: UNIV   Warn Stage(ft): 101.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
WEST SIDE OF KIRKMAN RD TO INLET NPG-50

Stage(ft)	Area(ac)
95.000	0.1000
101.000	0.1000

Name: DOT-3   Base Flow(cfs): 0.000   Init Stage(ft): 95.000
Group: UNIV   Warn Stage(ft): 101.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
WEST SIDE OF KIRKMAN RD TO INLET NPG-51

Stage(ft)	Area(ac)
95.000	0.1000
101.000	0.1000

Name: DPHS   Base Flow(cfs): 0.000   Init Stage(ft): 120.000
Group: UNIV   Warn Stage(ft): 120.000
Type: Time/Stage

DR. PHILLIPS HS - DUMMY NODE FOR RATING CURVE

Time(hrs)	Stage(ft)
0.00	120.000
140.00	120.000

```
--------------------------------------------------------------------------------------------
      Name: DS15              Base Flow(cfs): 0.000          Init Stage(ft): 101.800
     Group: UNIV                                             Warn Stage(ft): 105.000
      Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

      Stage(ft)        Area(ac)
--------------- ---------------
        101.800          0.1000
        105.000          0.1000
        106.000          0.3600

--------------------------------------------------------------------------------------------
      Name: DS17              Base Flow(cfs): 0.000          Init Stage(ft): 95.480
     Group: UNIV                                             Warn Stage(ft): 103.000
      Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

      Stage(ft)        Area(ac)
--------------- ---------------
         95.480          0.1000
        105.000          0.1000

--------------------------------------------------------------------------------------------
      Name: DS18              Base Flow(cfs): 0.000          Init Stage(ft): 95.330
     Group: UNIV                                             Warn Stage(ft): 102.000
      Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

      Stage(ft)        Area(ac)
--------------- ---------------
         95.330          0.1000
        105.000          0.1000

--------------------------------------------------------------------------------------------
      Name: DS18A             Base Flow(cfs): 0.000          Init Stage(ft): 95.200
     Group: UNIV                                             Warn Stage(ft): 102.000
      Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

      Stage(ft)        Area(ac)
--------------- ---------------
         95.200          0.1000
        105.000          0.1000

--------------------------------------------------------------------------------------------
      Name: DS20              Base Flow(cfs): 0.000          Init Stage(ft): 94.140
     Group: UNIV                                             Warn Stage(ft): 105.000
      Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

NOTE:  STAGE AREA ADDED BY INWOOD BASED ON SFWMD 1' CONTOURS, 2002.

      Stage(ft)        Area(ac)
--------------- ---------------
```

94.140	0.1000
99.000	0.1173
102.000	0.7644

Name: DS21 Base Flow(cfs): 0.000 Init Stage(ft): 93.500
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

Stage(ft)	Area(ac)
93.500	0.1000
105.000	0.1000

Name: DS22 Base Flow(cfs): 0.000 Init Stage(ft): 95.730
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********.
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

Stage(ft)	Area(ac)
94.980	0.1000
105.000	0.1000

Name: DS23 Base Flow(cfs): 0.000 Init Stage(ft): 95.440
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

NOTE: STAGE AREA ADDED BY INWOOD BASED ON SFWMD 1' CONTOURS, 2002.

Stage(ft)	Area(ac)
95.300	0.1000
100.000	0.1067
102.000	0.2717
103.000	0.3585

Name: DS26 Base Flow(cfs): 0.000 Init Stage(ft): 96.370
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

Stage(ft)	Area(ac)
96.370	0.1000
105.000	0.1000

Name: DS27 Base Flow(cfs): 0.000 Init Stage(ft): 92.900
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********

INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

Stage(ft)	Area(ac)
92.900	0.1000
105.000	0.1000

Name: DS29 Base Flow(cfs): 0.000 Init Stage(ft): 92.630
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

Stage(ft)	Area(ac)
92.630	0.1000
105.000	0.1000

Name: DS30-32 Base Flow(cfs): 0.000 Init Stage(ft): 93.690
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
MAIN OUTFALL FROM UNIVERSAL EAST OF KIRKMAN RD

Stage(ft)	Area(ac)
93.690	0.1000
98.000	0.1405
99.000	0.5494

Name: DS31 Base Flow(cfs): 0.000 Init Stage(ft): 94.100
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

Stage(ft)	Area(ac)
94.100	0.1000
105.000	0.1000

Name: DS34 Base Flow(cfs): 0.000 Init Stage(ft): 92.300
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

Stage(ft)	Area(ac)
92.300	0.1000
105.000	0.1000

Name: DS35-36 Base Flow(cfs): 0.000 Init Stage(ft): 92.000
Group: UNIV Warn Stage(ft): 98.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)

*******ORIGINAL PERMIT COMMENT***********
TAILWATER CONDITION AT UPSTREAM END OF BELZ CANAL

Stage(ft)	Area(ac)
91.940	0.1000
95.000	0.1000
97.000	0.1600
98.000	1.2300

Name: HILTON_N10 Base Flow(cfs): 0.000 Init Stage(ft): 97.500
Group: UNIV Warn Stage(ft): 103.000
Type: Stage/Area

NODE DATA REFERENCED FROM AMERICAN WAY HILTON PERMIT MODEL (MARCH, 2001)
*******ORIGINAL PERMIT COMMENT***********
NORTH DRAINAGE BASIN OFFLINE CONTROL STRUCTURE

Stage(ft)	Area(ac)
97.500	0.0001
103.000	0.0001
104.000	3.3000

Name: HILTON_N20 Base Flow(cfs): 0.000 Init Stage(ft): 98.500
Group: UNIV Warn Stage(ft): 103.000
Type: Stage/Area

NODE DATA REFERENCED FROM AMERICAN WAY HILTON PERMIT MODEL (MARCH, 2001)
*******ORIGINAL PERMIT COMMENT***********
NORTH DRAINAGE BASIN W.Q. POND

Stage(ft)	Area(ac)
98.500	0.1260
99.500	0.1860
100.500	0.2460
101.500	0.3070
102.500	0.3670
103.000	0.8300

Name: HILTON_N30 Base Flow(cfs): 0.000 Init Stage(ft): 97.500
Group: UNIV Warn Stage(ft): 103.000
Type: Stage/Area

NODE DATA REFERENCED FROM AMERICAN WAY HILTON PERMIT MODEL (MARCH, 2001)
*******ORIGINAL PERMIT COMMENT***********
NORTH DRAINAGE BASIN ATTENUATION POND

Stage(ft)	Area(ac)
97.000	0.0010
97.500	0.0770
98.500	0.1210
99.500	0.1640
100.500	0.2080
101.500	0.2520
102.500	0.2950
103.000	0.9400

Name: HILTON_SN10 Base Flow(cfs): 0.000 Init Stage(ft): 103.500
Group: UNIV Warn Stage(ft): 106.500
Type: Stage/Area

NODE DATA REFERENCED FROM AMERICAN WAY HILTON PERMIT MODEL (MARCH, 2001)
*******ORIGINAL PERMIT COMMENT***********
SOUTH DRAINAGE BASIN OFFLINE CONTROL STRUCTURE

Stage(ft)	Area(ac)
103.500	0.0001
106.500	0.0001

```
-----------------------------------------------------------------------------------------
      Name: HILTON_SN20         Base Flow(cfs): 0.000          Init Stage(ft): 103.500
     Group: UNIV                                               Warn Stage(ft): 106.500
      Type: Stage/Area

NODE DATA REFERENCED FROM AMERICAN WAY HILTON PERMIT MODEL (MARCH, 2001)
*******ORIGINAL PERMIT COMMENT***********
NORTH DRAINAGE BASIN W.Q POND

      Stage(ft)        Area(ac)
--------------- ---------------
        103.500          0.0600
        104.500          0.0870
        105.500          0.1150
        106.500          0.1420

-----------------------------------------------------------------------------------------
      Name: HILTON_SN30         Base Flow(cfs): 0.000          Init Stage(ft): 102.500
     Group: UNIV                                               Warn Stage(ft): 106.500
      Type: Stage/Area

NODE DATA REFERENCED FROM AMERICAN WAY HILTON PERMIT MODEL (MARCH, 2001)
*******ORIGINAL PERMIT COMMENT***********
NORTH DRAINAGE BASIN ATTENUATION POND

      Stage(ft)        Area(ac)
--------------- ---------------
        102.500          0.0000
        103.490          0.0000
        103.500          0.0590
        104.500          0.0880
        105.500          0.1170
        106.500          0.1460

-----------------------------------------------------------------------------------------
      Name: IOA                 Base Flow(cfs): 0.000          Init Stage(ft): 96.000
     Group: UNIV                                               Warn Stage(ft): 105.000
      Type: Stage/Area

UNIVERSAL ISLANDS OF ADVENTURE STRUCTURE DMH-HW14

      Stage(ft)        Area(ac)
--------------- ---------------
         82.190          0.1000
        115.000          0.1000

-----------------------------------------------------------------------------------------
      Name: MOTEL6_POND1        Base Flow(cfs): 0.000          Init Stage(ft): 100.000
     Group: UNIV                                               Warn Stage(ft): 104.000
      Type: Stage/Area

NODE DATA REFERENCED FROM MOTEL 6 PERMIT DATA

      Stage(ft)        Area(ac)
--------------- ---------------
        100.000          0.0010
        101.000          0.0510
        102.000          0.0770
        103.000          0.1230
        104.000          0.1650

-----------------------------------------------------------------------------------------
      Name: MOTEL6_POND2        Base Flow(cfs): 0.000          Init Stage(ft): 99.000
     Group: UNIV                                               Warn Stage(ft): 104.000
      Type: Stage/Area

NODE DATA REFERENCED FROM MOTEL 6 PERMIT DATA

      Stage(ft)        Area(ac)
--------------- ---------------
         99.000          0.0010
        100.000          0.2130
        101.000          0.2540
        102.000          0.2970
        103.000          0.3430
```

```
        104.000          0.3920

-----------------------------------------------------------------------------------------------
      Name: NODE-D3              Base Flow(cfs): 0.000          Init Stage(ft): 96.000
     Group: UNIV                                                Warn Stage(ft): 108.000
      Type: Stage/Area

JUNCTION NODE "D3"

      Stage(ft)        Area(ac)
--------------- ---------------
         96.000          0.0100
        108.000          0.0100

-----------------------------------------------------------------------------------------------
      Name: NODE-D4              Base Flow(cfs): 0.000          Init Stage(ft): 96.000
     Group: UNIV                                                Warn Stage(ft): 104.230
      Type: Stage/Area

MANHOLE DCI-UB17 - CONNECTION POINT FOR BASIN SPG

      Stage(ft)        Area(ac)
--------------- ---------------
         85.660          0.1000
        104.230          0.1000

-----------------------------------------------------------------------------------------------
      Name: NODE-D6              Base Flow(cfs): 0.000          Init Stage(ft): 96.000
     Group: UNIV                                                Warn Stage(ft): 104.100
      Type: Stage/Area

MH-NL-8 ASSUMED AS CONNECTION POINT FOR BASIN D-6

      Stage(ft)        Area(ac)
--------------- ---------------
         89.760          0.1000
        104.100          0.1000

-----------------------------------------------------------------------------------------------
      Name: NODE-F               Base Flow(cfs): 0.000          Init Stage(ft): 96.000
     Group: UNIV                                                Warn Stage(ft): 108.000
      Type: Stage/Area

JUNCTION NODE "F"

      Stage(ft)        Area(ac)
--------------- ---------------
         96.000          0.0100
        108.000          0.0100

-----------------------------------------------------------------------------------------------
      Name: NODE-G1              Base Flow(cfs): 0.000          Init Stage(ft): 108.310
     Group: UNIV                                                Warn Stage(ft): 116.510
      Type: Stage/Area



      Stage(ft)        Area(ac)
--------------- ---------------
        108.310          0.0003
        116.510          0.0003

-----------------------------------------------------------------------------------------------
      Name: NODE-G2              Base Flow(cfs): 0.000          Init Stage(ft): 103.950
     Group: UNIV                                                Warn Stage(ft): 125.580
      Type: Stage/Area

Last Manhole upstream of Pond F1 from Cabana Bay Hotel

      Stage(ft)        Area(ac)
--------------- ---------------
        103.950          0.0100
        125.580          0.0100

-----------------------------------------------------------------------------------------------
      Name: NODE-H1              Base Flow(cfs): 0.000          Init Stage(ft): 96.000
```

Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

JUNCTION NODE "H1"

Stage(ft)	Area(ac)
93.000	0.1000
105.000	0.1000

Name: OVERFLOW Base Flow(cfs): 0.000 Init Stage(ft): 96.000
Group: UNIV Warn Stage(ft): 103.000
Type: Stage/Area

STUCTURE NL-3 (EMERGENCY OVERFLOW FROM POND 'H')

Stage(ft)	Area(ac)
86.000	0.1000
103.000	0.1000

Name: POND-A Base Flow(cfs): 0.208 Init Stage(ft): 96.000
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
MASTER DRAINAGE SYSTEM POND 'A'

Stage(ft)	Area(ac)
96.000	2.3100
97.000	2.6400
98.000	2.8300
99.000	3.0100
100.000	3.2000
101.000	3.4000
102.000	3.6100
103.000	3.8300
104.000	4.0700
105.000	4.3200

Name: POND-B Base Flow(cfs): 0.000 Init Stage(ft): 99.940
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
MASTER DRAINAGE SYSTEM POND 'B'

Stage(ft)	Area(ac)
99.000	6.0600
105.000	6.0600

Name: POND-C Base Flow(cfs): 0.000 Init Stage(ft): 96.000
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
MASTER DRAINAGE SYSTEM POND 'C'

Stage(ft)	Area(ac)
96.000	6.2800
97.000	6.5600
98.000	6.8300
99.000	7.1200

100.000	7.4000
101.000	7.6900
102.000	7.9900
103.000	8.2800
104.000	8.5800
105.000	8.8900

Name: POND-D Base Flow(cfs): 0.316 Init Stage(ft): 96.000
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

MASTER DRAINAGE SYSTEM POND 'D'

Stage(ft)	Area(ac)
96.000	8.8800
97.000	9.1800
98.000	9.4500
99.000	9.7500
100.000	10.0200
101.000	10.3300
102.000	10.6500
103.000	10.9700
104.000	11.2900
105.000	13.6000

Name: POND-D2 Base Flow(cfs): 0.000 Init Stage(ft): 96.000
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

MASTER DRAINAGE SYSTEM POND 'D2'

Stage(ft)	Area(ac)
96.000	0.7700
97.000	0.8400
98.000	0.9200
99.000	1.0100
100.000	1.1500
101.000	1.4000
105.000	1.4000

Name: POND-D3 Base Flow(cfs): 0.000 Init Stage(ft): 96.000
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

MASTER DRAINAGE SYSTEM POND 'D3'

Stage(ft)	Area(ac)
96.000	0.4300
97.000	0.4800
98.000	0.5400
99.000	0.6100
100.000	0.6900
101.000	0.7800
102.000	0.9100
105.000	0.9100

Name: POND-E1 Base Flow(cfs): 0.150 Init Stage(ft): 114.000
Group: UNIV Warn Stage(ft): 116.000
Type: Stage/Area

MASTER DRAINAGE SYSTEM POND 'E1'

Stage(ft)	Area(ac)
110.000	0.4400
111.000	0.4900
112.000	0.5400
113.000	0.6400

114.000	0.7400
115.000	0.7400
116.000	0.7400

Name: POND-E2 Base Flow(cfs): 0.189 Init Stage(ft): 105.670
Group: UNIV Warn Stage(ft): 116.000
Type: Stage/Area

MASTER DRAINAGE SYSTEM POND 'E2'

Stage(ft)	Area(ac)
105.670	0.5000
107.000	0.5500
108.000	0.6200
109.000	0.7200
110.000	0.9200
111.000	1.2000
111.300	1.3000
112.000	5.0000
114.000	10.0000

Name: POND-F Base Flow(cfs): 0.246 Init Stage(ft): 100.000
Group: UNIV Warn Stage(ft): 108.000
Type: Stage/Area

MASTER DRAINAGE SYSTEM POND 'F'

Stage(ft)	Area(ac)
100.000	4.1300
101.000	4.3000
102.000	4.5400
103.000	4.7900
104.000	5.0500
105.000	5.3000
106.000	5.5600
107.000	5.8300
108.000	6.0900

Name: POND-F1 Base Flow(cfs): 0.000 Init Stage(ft): 104.000
Group: UNIV Warn Stage(ft): 113.000
Type: Stage/Area

MASTER DRAINAGE SYSTEM POND 'F1'

Stage(ft)	Area(ac)
104.000	4.5800
105.000	4.7400
106.000	4.9100
107.000	5.0700
108.000	5.2400
109.000	5.4100
110.000	5.5800
111.000	5.7500
112.000	5.9100
113.000	6.0800
114.000	6.2400

Name: POND-F2 Base Flow(cfs): 0.000 Init Stage(ft): 102.000
Group: UNIV Warn Stage(ft): 108.000
Type: Stage/Area

PROPOSED POND 'F3' TO THE NORTH OF ROYAL PACIFIC

Stage(ft)	Area(ac)
102.000	0.7900
103.000	0.9100
104.000	1.0200
105.000	1.1400

```
        106.000          1.2900
        107.000          1.4400
        108.000          1.5900

-----------------------------------------------------------------------------------------
      Name: POND-H              Base Flow(cfs): 0.191          Init Stage(ft): 102.000
     Group: UNIV                                               Warn Stage(ft): 105.000
      Type: Stage/Area

MASTER DRAINAGE SYSTEM POND 'H'

      Stage(ft)        Area(ac)
--------------- ---------------
        102.000         23.1000
        103.000         23.6300
        104.000         24.5400
        105.000         25.4800
        106.000         26.3900
        107.000         27.5200

-----------------------------------------------------------------------------------------
      Name: POND-H1             Base Flow(cfs): 0.000          Init Stage(ft): 101.000
     Group: UNIV                                               Warn Stage(ft): 105.000
      Type: Stage/Area

MASTER DRAINAGE SYSTEM POND 'H1'

      Stage(ft)        Area(ac)
--------------- ---------------
        101.000          1.1500
        102.000          1.2400
        103.000          1.3400
        104.000          1.4400
        105.000          1.5400

-----------------------------------------------------------------------------------------
      Name: POND-I              Base Flow(cfs): 0.288          Init Stage(ft): 104.080
     Group: UNIV                                               Warn Stage(ft): 106.000
      Type: Stage/Area

MASTER DRAINAGE SYSTEM POND 'I'

      Stage(ft)        Area(ac)
--------------- ---------------
        104.000          9.4200
        105.000          9.4200
        106.000          9.7400

-----------------------------------------------------------------------------------------
      Name: SPG                 Base Flow(cfs): 0.000          Init Stage(ft): 96.000
     Group: UNIV                                               Warn Stage(ft): 106.720
      Type: Stage/Area

MANHOLE DMH-UB13 - CONNECTION POINT FOR BASIN D-4

      Stage(ft)        Area(ac)
--------------- ---------------
         85.880          0.1000
        106.720          0.1000

-----------------------------------------------------------------------------------------
      Name: SUPER8_POND         Base Flow(cfs): 0.000          Init Stage(ft): 98.700
     Group: UNIV                                               Warn Stage(ft): 103.000
      Type: Stage/Area

DESCRIPTION: DETENTION POND
LOCATION:  SUPER 8 HOTEL ALONG AMERICAN WAY
INTIAL STAGE:  POND CONTROL STRUCTURE V-NOTCH INVERT
WARNING STAGE:  POND TOP OF BANK
DATA SOURCES:  SUPER 8 HOTEL PERMIT; SFWMD 1' CONTOURS, 2002

      Stage(ft)        Area(ac)
--------------- ---------------
         98.000          0.1100
         99.000          0.1300
        100.000          0.1500
```

101.000	0.1700
102.000	0.2000
103.000	0.2200

Name: US15 Base Flow(cfs): 0.000 Init Stage(ft): 102.100
Group: UNIV Warn Stage(ft): 106.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

Stage(ft)	Area(ac)
102.100	0.1000
105.000	0.1000
106.000	0.6600

Name: US16 Base Flow(cfs): 0.000 Init Stage(ft): 95.740
Group: UNIV Warn Stage(ft): 102.500
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

Stage(ft)	Area(ac)
95.740	0.1000
101.000	0.3051
102.000	0.9082
103.000	1.9306
104.000	4.4531

Name: US18 Base Flow(cfs): 0.000 Init Stage(ft): 97.100
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

Stage(ft)	Area(ac)
97.100	0.1000
105.000	0.1000

Name: US20 Base Flow(cfs): 0.000 Init Stage(ft): 94.650
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

Stage(ft)	Area(ac)
94.650	0.1000
99.000	0.2059
100.000	0.4601
101.000	0.8765
102.000	1.6096

Name: US21 Base Flow(cfs): 0.000 Init Stage(ft): 95.620
Group: UNIV Warn Stage(ft): 102.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

Stage(ft)	Area(ac)
95.620	0.1000
100.000	0.1000
101.000	5.0100
102.000	5.8500

Name: US22 Base Flow(cfs): 0.000 Init Stage(ft): 95.730
Group: UNIV Warn Stage(ft): 102.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

Stage(ft)	Area(ac)
95.100	0.1000
99.000	0.2000
100.000	0.3900
101.000	4.6028
102.000	6.3775

Name: US23 Base Flow(cfs): 0.000 Init Stage(ft): 95.730
Group: UNIV Warn Stage(ft): 105.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

Stage(ft)	Area(ac)
95.730	0.1000
105.000	0.1000

Name: US26 Base Flow(cfs): 0.000 Init Stage(ft): 96.500
Group: UNIV Warn Stage(ft): 102.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

Stage(ft)	Area(ac)
96.500	0.1000
100.000	4.5400
101.000	6.1200
102.000	7.0100

Name: US27 Base Flow(cfs): 0.000 Init Stage(ft): 97.800
Group: UNIV Warn Stage(ft): 103.000
Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

Stage(ft)	Area(ac)
97.800	0.1000
101.000	1.5500

```
        102.000          2.0100
        103.000          2.4100

----------------------------------------------------------------------------------------------
      Name: US29              Base Flow(cfs): 0.000          Init Stage(ft): 96.840
     Group: UNIV                                             Warn Stage(ft): 103.000
      Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

      Stage(ft)        Area(ac)
--------------- ---------------
         96.840          0.1000
         99.000          2.4900
        100.000          3.0600
        101.000          3.4000
        102.000          3.7300
        103.000          4.0000

----------------------------------------------------------------------------------------------
      Name: US30-32           Base Flow(cfs): 0.000          Init Stage(ft): 94.330
     Group: UNIV                                             Warn Stage(ft): 105.000
      Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
MAIN OUTFALL FROM UNIVERSAL WEST OF KIRKMAN RD

      Stage(ft)        Area(ac)
--------------- ---------------
         94.000          0.1000
        105.000          0.1000

----------------------------------------------------------------------------------------------
      Name: US31              Base Flow(cfs): 0.000          Init Stage(ft): 94.160
     Group: UNIV                                             Warn Stage(ft): 100.000
      Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

      Stage(ft)        Area(ac)
--------------- ---------------
         94.160          0.1000
         98.000          0.2300
         99.000          4.3000
        100.000          6.4200

----------------------------------------------------------------------------------------------
      Name: US33              Base Flow(cfs): 0.000          Init Stage(ft): 96.300
     Group: UNIV                                             Warn Stage(ft): 105.000
      Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

NOTE: STAGE AREA ADDED BY INWOOD BASED ON SFWMD 1' CONTOURS, 2002.

      Stage(ft)        Area(ac)
--------------- ---------------
         96.300          0.1000
         99.000          0.7357
        100.000          2.7671
        101.000          8.3428

----------------------------------------------------------------------------------------------
      Name: US34              Base Flow(cfs): 0.000          Init Stage(ft): 95.380
     Group: UNIV                                             Warn Stage(ft): 105.000
```

```
      Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

      Stage(ft)        Area(ac)
--------------- ---------------
         95.380          0.1000
        105.000          0.1000

------------------------------------------------------------------------------------------
      Name: US35-36             Base Flow(cfs): 0.000          Init Stage(ft): 91.690
     Group: UNIV                                               Warn Stage(ft): 105.000
      Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
INTERSTATE-4 SYSTEM (FROM GREINER CALCS)

      Stage(ft)        Area(ac)
--------------- ---------------
         91.690          0.1000
        105.000          0.1000

------------------------------------------------------------------------------------------
      Name: WEIR-E2             Base Flow(cfs): 0.000          Init Stage(ft): 105.670
     Group: UNIV                                               Warn Stage(ft): 120.000
      Type: Stage/Area

NODE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM (08/26/99)
*******ORIGINAL PERMIT COMMENT***********
DRAINAGE CONTROL STRUCTURE FOR POND 'E2' OUTFALL

      Stage(ft)        Area(ac)
--------------- ---------------
        104.000          0.1000
        120.000          0.1000

------------------------------------------------------------------------------------------
      Name: WEIR-I              Base Flow(cfs): 0.000          Init Stage(ft): 104.080
     Group: UNIV                                               Warn Stage(ft): 106.000
      Type: Stage/Area

DRAINAGE CONTROL STRUCTURE FOR POND 'I' OUTFALL

      Stage(ft)        Area(ac)
--------------- ---------------
        102.000          0.1000
        112.000          0.1000

==========================================================================================
==== Operating Tables ====================================================================
==========================================================================================

      Name: OT-DPHS              Group: UNIV
      Type: Rating Curve
  Function: Time vs. Discharge

DISCHARGE FROM DR PHILLIPS HS TO UNIVERSAL STUDIOS POND-E1

      Time(hrs)  Discharge(cfs)
--------------- ---------------
           0.00            1.00
           8.00            1.00
          10.00            4.00
          12.00           10.00
          14.00           16.00
          16.00           20.00
          18.00           26.00
          24.00           12.00
          48.00            1.00
          90.00            1.00
```

```
        150.00          1.00

==========================================================================================
==== Pipes ===============================================================================
==========================================================================================

        Name: 15                  From Node: US15             Length(ft): 125.00
       Group: UNIV                  To Node: DS15                  Count: 1
                                                       Friction Equation: Average Conveyance
             UPSTREAM       DOWNSTREAM                Solution Algorithm: Automatic
     Geometry: Circular     Circular                                Flow: Both
     Span(in): 24.00        24.00                     Entrance Loss Coef: 0.50
     Rise(in): 24.00        24.00                         Exit Loss Coef: 1.00
   Invert(ft): 102.100      102.000                       Bend Loss Coef: 0.00
  Manning's N: 0.013000     0.013000                    Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000        0.000                        Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000        0.000                      Stabilizer Option: None


Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
GREINER'S SYSTEM

----------------------------------------------------------------------------------------------------
        Name: 16                  From Node: US16             Length(ft): 597.00
       Group: UNIV                  To Node: DS17                  Count: 1
                                                       Friction Equation: Average Conveyance
             UPSTREAM       DOWNSTREAM                Solution Algorithm: Automatic
     Geometry: Horz Ellipse Horz Ellipse                            Flow: Both
     Span(in): 60.00        60.00                     Entrance Loss Coef: 0.50
     Rise(in): 38.00        38.00                         Exit Loss Coef: 0.00
   Invert(ft): 95.740       95.480                        Bend Loss Coef: 0.70
  Manning's N: 0.012000     0.012000                    Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000        0.000                        Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000        0.000                      Stabilizer Option: None


Upstream FHWA Inlet Edge Description:
Horizontal Ellipse Concrete: Square edge with headwall

Downstream FHWA Inlet Edge Description:
Horizontal Ellipse Concrete: Square edge with headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
GREINER'S SYSTEM
**************NOTE*****************
BEND LOSS IN PIPE MODIFIED BY INWOOD.

----------------------------------------------------------------------------------------------------
        Name: 17-18               From Node: DS17             Length(ft): 428.00
       Group: UNIV                  To Node: DS18                  Count: 1
                                                       Friction Equation: Average Conveyance
             UPSTREAM       DOWNSTREAM                Solution Algorithm: Automatic
     Geometry: Horz Ellipse Horz Ellipse                            Flow: Both
     Span(in): 76.00        76.00                     Entrance Loss Coef: 0.50
     Rise(in): 48.00        48.00                         Exit Loss Coef: 0.00
   Invert(ft): 95.480       95.330                        Bend Loss Coef: 0.45
  Manning's N: 0.011000     0.011000                    Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000        0.000                        Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000        0.000                      Stabilizer Option: None


Upstream FHWA Inlet Edge Description:
Horizontal Ellipse Concrete: Square edge with headwall

Downstream FHWA Inlet Edge Description:
```

Horizontal Ellipse Concrete: Square edge with headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
GREINER'S SYSTEM
**************NOTE*****************
BEND LOSS IN PIPE MODIFIED BY INWOOD.

```
----------------------------------------------------------------------------------------------------
         Name: 18-18A             From Node: DS18              Length(ft): 323.00
        Group: UNIV                 To Node: DS18A                  Count: 1
                                                        Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM                Solution Algorithm: Automatic
     Geometry: Horz Ellipse   Horz Ellipse                           Flow: Both
     Span(in): 76.00          76.00                    Entrance Loss Coef: 0.50
     Rise(in): 48.00          48.00                        Exit Loss Coef: 0.50
   Invert(ft): 95.330         95.200                       Bend Loss Coef: 0.15
  Manning's N: 0.011000       0.011000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                      Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                    Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Horizontal Ellipse Concrete: Square edge with headwall

Downstream FHWA Inlet Edge Description:
Horizontal Ellipse Concrete: Square edge with headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
GREINER'S SYSTEM
**************NOTE*****************
BEND LOSS IN PIPE MODIFIED BY INWOOD.

```
----------------------------------------------------------------------------------------------------
         Name: 20                 From Node: US20              Length(ft): 201.00
        Group: UNIV                 To Node: DS20                   Count: 2
                                                        Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM                Solution Algorithm: Automatic
     Geometry: Circular       Circular                               Flow: Both
     Span(in): 48.00          48.00                    Entrance Loss Coef: 0.50
     Rise(in): 48.00          48.00                        Exit Loss Coef: 1.00
   Invert(ft): 94.650         94.140                       Bend Loss Coef: 0.00
  Manning's N: 0.012000       0.012000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                      Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                    Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
GREINER'S SYSTEM

```
----------------------------------------------------------------------------------------------------
         Name: 21                 From Node: US21              Length(ft): 100.00
        Group: UNIV                 To Node: DS21                   Count: 1
                                                        Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM                Solution Algorithm: Automatic
     Geometry: Circular       Circular                               Flow: Both
     Span(in): 24.00          24.00                    Entrance Loss Coef: 0.50
     Rise(in): 24.00          24.00                        Exit Loss Coef: 1.00
   Invert(ft): 95.620         95.500                       Bend Loss Coef: 0.00
  Manning's N: 0.013000       0.013000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                      Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                    Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:

Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
GREINER'S SYSTEM

```
----------------------------------------------------------------------------------------------------
         Name: 22                From Node: US22              Length(ft): 120.00
        Group: UNIV                To Node: DS22                   Count: 1
                                                       Friction Equation: Average Conveyance
             UPSTREAM       DOWNSTREAM                Solution Algorithm: Automatic
     Geometry: Circular       Circular                              Flow: Both
     Span(in): 24.00          24.00                   Entrance Loss Coef: 0.50
     Rise(in): 24.00          24.00                       Exit Loss Coef: 1.00
   Invert(ft): 95.620         95.500                      Bend Loss Coef: 0.00
  Manning's N: 0.013000       0.013000                 Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                     Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                    Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
GREINER'S SYSTEM

```
----------------------------------------------------------------------------------------------------
         Name: 23                From Node: US23              Length(ft): 143.00
        Group: UNIV                To Node: DS23                   Count: 1
                                                       Friction Equation: Average Conveyance
             UPSTREAM       DOWNSTREAM                Solution Algorithm: Automatic
     Geometry: Circular       Circular                              Flow: Both
     Span(in): 24.00          24.00                   Entrance Loss Coef: 0.50
     Rise(in): 24.00          24.00                       Exit Loss Coef: 1.00
   Invert(ft): 95.730         95.440                      Bend Loss Coef: 0.00
  Manning's N: 0.013000       0.013000                 Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                     Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                    Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
GREINER'S SYSTEM

```
----------------------------------------------------------------------------------------------------
         Name: 26                From Node: US26              Length(ft): 91.00
        Group: UNIV                To Node: DS26                   Count: 1
                                                       Friction Equation: Average Conveyance
             UPSTREAM       DOWNSTREAM                Solution Algorithm: Automatic
     Geometry: Circular       Circular                              Flow: Both
     Span(in): 24.00          24.00                   Entrance Loss Coef: 0.50
     Rise(in): 24.00          24.00                       Exit Loss Coef: 1.00
   Invert(ft): 96.500         96.370                      Bend Loss Coef: 0.00
  Manning's N: 0.013000       0.013000                 Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                     Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                    Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
GREINER'S SYSTEM

```
----------------------------------------------------------------------------------------------------
         Name: 27                 From Node: US27            Length(ft): 94.00
        Group: UNIV                 To Node: DS27                 Count: 1
                                                      Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM              Solution Algorithm: Automatic
     Geometry: Circular       Circular                             Flow: Both
     Span(in): 18.00          18.00                  Entrance Loss Coef: 0.50
     Rise(in): 18.00          18.00                      Exit Loss Coef: 1.00
   Invert(ft): 97.800         97.720                     Bend Loss Coef: 0.00
  Manning's N: 0.013000       0.013000                 Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                     Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                   Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
GREINER'S SYSTEM

```
----------------------------------------------------------------------------------------------------
         Name: 29                 From Node: US29            Length(ft): 100.00
        Group: UNIV                 To Node: DS29                 Count: 1
                                                      Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM              Solution Algorithm: Automatic
     Geometry: Circular       Circular                             Flow: Both
     Span(in): 18.00          18.00                  Entrance Loss Coef: 0.50
     Rise(in): 18.00          18.00                      Exit Loss Coef: 1.00
   Invert(ft): 96.840         96.010                     Bend Loss Coef: 0.00
  Manning's N: 0.013000       0.013000                 Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                     Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                   Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
GREINER'S SYSTEM

```
----------------------------------------------------------------------------------------------------
         Name: 30A                From Node: US30-32         Length(ft): 321.00
        Group: UNIV                 To Node: DS30-32              Count: 1
                                                      Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM              Solution Algorithm: Automatic
     Geometry: Circular       Circular                             Flow: Both
     Span(in): 48.00          48.00                  Entrance Loss Coef: 0.50
     Rise(in): 48.00          48.00                      Exit Loss Coef: 1.00
   Invert(ft): 94.330         93.690                     Bend Loss Coef: 0.00
  Manning's N: 0.012000       0.012000                 Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                     Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                   Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
48" RCP AT MAIN OUTFALL FOR UNIVERSAL

```
----------------------------------------------------------------------------------------------------
         Name: 30B                From Node: US30-32           Length(ft): 114.00
        Group: UNIV                 To Node: DS31                   Count: 1
                                                       Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM               Solution Algorithm: Automatic
     Geometry: Circular      Circular                               Flow: Both
     Span(in): 48.00         48.00                   Entrance Loss Coef: 0.50
     Rise(in): 48.00         48.00                       Exit Loss Coef: 0.00
   Invert(ft): 94.330        94.100                      Bend Loss Coef: 0.00
  Manning's N: 0.012000      0.012000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                      Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                     Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
48" RCP AT MAIN OUTFALL FOR UNIVERSAL

```
----------------------------------------------------------------------------------------------------
         Name: 30C                From Node: DS31              Length(ft): 207.00
        Group: UNIV                 To Node: DS30-32                Count: 1
                                                       Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM               Solution Algorithm: Automatic
     Geometry: Circular      Circular                               Flow: Both
     Span(in): 48.00         48.00                   Entrance Loss Coef: 0.50
     Rise(in): 48.00         48.00                       Exit Loss Coef: 1.00
   Invert(ft): 94.100        93.690                      Bend Loss Coef: 0.00
  Manning's N: 0.012000      0.012000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                      Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                     Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
48" RCP AT MAIN OUTFALL FOR UNIVERSAL

```
----------------------------------------------------------------------------------------------------
         Name: 31                 From Node: US31              Length(ft): 20.00
        Group: UNIV                 To Node: DS31                   Count: 1
                                                       Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM               Solution Algorithm: Automatic
     Geometry: Circular      Circular                               Flow: Both
     Span(in): 18.00         18.00                   Entrance Loss Coef: 0.50
     Rise(in): 18.00         18.00                       Exit Loss Coef: 0.00
   Invert(ft): 94.160        94.100                      Bend Loss Coef: 0.00
  Manning's N: 0.013000      0.013000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                      Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                     Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:

```
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
GREINER'S SYSTEM

----------------------------------------------------------------------------------------------------
         Name: 33                 From Node: US33              Length(ft): 50.00
        Group: UNIV                 To Node: US34                   Count: 1
                                                       Friction Equation: Average Conveyance
             UPSTREAM       DOWNSTREAM                Solution Algorithm: Automatic
     Geometry: Circular       Circular                              Flow: Both
     Span(in): 24.00          24.00                   Entrance Loss Coef: 0.50
     Rise(in): 24.00          24.00                       Exit Loss Coef: 1.00
   Invert(ft): 96.300         95.380                      Bend Loss Coef: 0.00
  Manning's N: 0.013000       0.013000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                      Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                    Stabilizer Option: None


Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
GREINER'S SYSTEM

----------------------------------------------------------------------------------------------------
         Name: 35                 From Node: US35-36           Length(ft): 200.00
        Group: UNIV                 To Node: DS35-36                Count: 1
                                                       Friction Equation: Average Conveyance
             UPSTREAM       DOWNSTREAM                Solution Algorithm: Automatic
     Geometry: Circular       Circular                              Flow: Both
     Span(in): 48.00          48.00                   Entrance Loss Coef: 0.50
     Rise(in): 48.00          48.00                       Exit Loss Coef: 1.00
   Invert(ft): 92.090         91.940                      Bend Loss Coef: 0.00
  Manning's N: 0.024000       0.024000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                      Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                    Stabilizer Option: None


Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
48" CMP UNDER I-4 (GREINER'S)

----------------------------------------------------------------------------------------------------
         Name: CC-A               From Node: POND-A            Length(ft): 56.00
        Group: UNIV                 To Node: DCS-1                  Count: 1
                                                       Friction Equation: Automatic
             UPSTREAM       DOWNSTREAM                Solution Algorithm: Most Restrictive
     Geometry: Circular       Circular                              Flow: Both
     Span(in): 48.00          48.00                   Entrance Loss Coef: 0.70
     Rise(in): 48.00          48.00                       Exit Loss Coef: 1.00
   Invert(ft): 89.820         90.000                      Bend Loss Coef: 0.00
  Manning's N: 0.012000       0.012000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                      Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                    Stabilizer Option: None


Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall
```

PIPE BETWEEN POND 'A' AND DCS-1

```
-----------------------------------------------------------------------------------------------------
         Name: CC-C              From Node: POND-C           Length(ft): 1790.00
        Group: UNIV                To Node: DCS-2                 Count: 1
                                                     Friction Equation: Average Conveyance
              UPSTREAM      DOWNSTREAM               Solution Algorithm: Automatic
     Geometry: Circular     Circular                               Flow: Both
     Span(in): 48.00        48.00                    Entrance Loss Coef: 0.70
     Rise(in): 48.00        48.00                        Exit Loss Coef: 1.00
   Invert(ft): 89.970       84.510                       Bend Loss Coef: 6.10
  Manning's N: 0.012000     0.012000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000        0.000                      Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000        0.000                     Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE BETWEEN POND 'C' AND DCS-2

```
-----------------------------------------------------------------------------------------------------
         Name: CC-D              From Node: POND-D           Length(ft): 810.00
        Group: UNIV                To Node: NODE-D4               Count: 1
                                                     Friction Equation: Average Conveyance
              UPSTREAM      DOWNSTREAM               Solution Algorithm: Automatic
     Geometry: Circular     Circular                               Flow: Both
     Span(in): 60.00        60.00                    Entrance Loss Coef: 0.70
     Rise(in): 60.00        60.00                        Exit Loss Coef: 0.00
   Invert(ft): 85.500       85.880                       Bend Loss Coef: 2.10
  Manning's N: 0.011000     0.011000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000        0.000                      Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000        0.000                     Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

OUTFALL PIPE FROM POND 'D' NORTHWARD TO DMH-UB13

```
-----------------------------------------------------------------------------------------------------
         Name: CC-D-DD           From Node: POND-D           Length(ft): 163.00
        Group: UNIV                To Node: DCS-3A                Count: 1
                                                     Friction Equation: Average Conveyance
              UPSTREAM      DOWNSTREAM               Solution Algorithm: Automatic
     Geometry: Circular     Circular                               Flow: Both
     Span(in): 24.00        24.00                    Entrance Loss Coef: 0.70
     Rise(in): 24.00        24.00                        Exit Loss Coef: 1.00
   Invert(ft): 87.440       94.960                       Bend Loss Coef: 5.40
  Manning's N: 0.013000     0.013000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000        0.000                      Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000        0.000                     Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

DRAWDOWN FOR POND 'D' (equivalent pipe length)

```
-----------------------------------------------------------------------------------------------------
         Name: CC-D2             From Node: POND-D2          Length(ft): 75.00
        Group: UNIV                To Node: POND-D                Count: 1
                                                     Friction Equation: Average Conveyance
```

```
             UPSTREAM      DOWNSTREAM               Solution Algorithm: Automatic
     Geometry: Circular      Circular                              Flow: Both
     Span(in): 54.00         54.00                  Entrance Loss Coef: 0.70
     Rise(in): 54.00         54.00                      Exit Loss Coef: 1.00
   Invert(ft): 90.000        90.000                     Bend Loss Coef: 0.00
  Manning's N: 0.011000      0.011000                 Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                     Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                   Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE BETWEEN POND 'D2' AND POND 'D'

```
----------------------------------------------------------------------------------------------------
         Name: CC-D3A            From Node: NODE-D3           Length(ft): 142.00
        Group: UNIV                To Node: POND-D3                Count: 1
                                                         Friction Equation: Average Conveyance
             UPSTREAM      DOWNSTREAM               Solution Algorithm: Automatic
     Geometry: Circular      Circular                              Flow: Both
     Span(in): 48.00         48.00                  Entrance Loss Coef: 1.00
     Rise(in): 48.00         48.00                      Exit Loss Coef: 1.00
   Invert(ft): 90.150        89.850                     Bend Loss Coef: 0.00
  Manning's N: 0.012000      0.012000                 Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                     Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                   Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE BETWEEN NODE 'D3' AND POND 'D3'

```
----------------------------------------------------------------------------------------------------
         Name: CC-D3B            From Node: POND-D3           Length(ft): 236.00
        Group: UNIV                To Node: POND-D2                Count: 1
                                                         Friction Equation: Average Conveyance
             UPSTREAM      DOWNSTREAM               Solution Algorithm: Automatic
     Geometry: Circular      Circular                              Flow: Both
     Span(in): 54.00         54.00                  Entrance Loss Coef: 0.70
     Rise(in): 54.00         54.00                      Exit Loss Coef: 1.00
   Invert(ft): 90.000        90.000                     Bend Loss Coef: 0.00
  Manning's N: 0.011000      0.011000                 Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                     Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                   Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE BETWEEN POND 'D3' AND POND 'D2'

```
----------------------------------------------------------------------------------------------------
         Name: CC-D4             From Node: NODE-D4           Length(ft): 394.00
        Group: UNIV                To Node: SPG                    Count: 1
                                                         Friction Equation: Average Conveyance
             UPSTREAM      DOWNSTREAM               Solution Algorithm: Automatic
     Geometry: Circular      Circular                              Flow: Both
     Span(in): 60.00         60.00                  Entrance Loss Coef: 0.70
     Rise(in): 60.00         60.00                      Exit Loss Coef: 0.00
   Invert(ft): 85.880        85.660                     Bend Loss Coef: 0.70
  Manning's N: 0.011000      0.011000                 Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                     Inlet Ctrl Spec: Use dn
```

```
 Bot Clip(in): 0.000          0.000                       Stabilizer Option: None


Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

OUTFALL PIPE FROM DMH-UB13 NORTHWARD TO DCI-UB17

----------------------------------------------------------------------------------------------------
         Name: CC-D6             From Node: NODE-D6           Length(ft): 845.00
        Group: UNIV                To Node: OVERFLOW               Count: 1
                                                           Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM                   Solution Algorithm: Automatic
     Geometry: Circular      Circular                                   Flow: Both
     Span(in): 54.00         54.00                        Entrance Loss Coef: 0.60
     Rise(in): 54.00         54.00                            Exit Loss Coef: 0.00
   Invert(ft): 89.810        86.080                           Bend Loss Coef: 2.60
  Manning's N: 0.012000      0.012000                      Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                           Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                        Stabilizer Option: None


Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE FROM MH IN BASIN D-6 TO EMERGENCY OVERFLOW

----------------------------------------------------------------------------------------------------
         Name: CC-DMH33          From Node: DMH-33            Length(ft): 160.00
        Group: UNIV                To Node: DCS-7                  Count: 1
                                                           Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM                   Solution Algorithm: Automatic
     Geometry: Circular      Circular                                   Flow: Both
     Span(in): 60.00         60.00                        Entrance Loss Coef: 0.50
     Rise(in): 60.00         60.00                            Exit Loss Coef: 1.00
   Invert(ft): 83.630        83.290                           Bend Loss Coef: 0.00
  Manning's N: 0.011000      0.011000                      Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                           Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                        Stabilizer Option: None


Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
OUTFALL PIPE FROM DCS-3 & DCS-3A TO DCS-7

----------------------------------------------------------------------------------------------------
         Name: CC-DOT1           From Node: DOT-1             Length(ft): 265.00
        Group: UNIV                To Node: DOT-2                  Count: 1
                                                           Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM                   Solution Algorithm: Automatic
     Geometry: Circular      Circular                                   Flow: Both
     Span(in): 30.00         30.00                        Entrance Loss Coef: 0.50
     Rise(in): 30.00         30.00                            Exit Loss Coef: 0.00
   Invert(ft): 95.600        95.280                           Bend Loss Coef: 0.00
  Manning's N: 0.013000      0.013000                      Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                           Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                        Stabilizer Option: None


Upstream FHWA Inlet Edge Description:
```

Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
CULVERT UNDER MAJOR BLVD
**************NOTE*****************
BEND LOSS IN PIPE MODIFIED BY INWOOD.

```
----------------------------------------------------------------------------------------------------
         Name: CC-DOT2            From Node: DOT-2           Length(ft): 590.00
        Group: UNIV                 To Node: DOT-3                Count: 1
                                                       Friction Equation: Average Conveyance
             UPSTREAM       DOWNSTREAM                Solution Algorithm: Automatic
     Geometry: Horz Ellipse   Horz Ellipse                          Flow: Both
     Span(in): 53.00          53.00                   Entrance Loss Coef: 0.50
     Rise(in): 34.00          34.00                       Exit Loss Coef: 0.00
   Invert(ft): 95.280         95.190                      Bend Loss Coef: 0.50
  Manning's N: 0.012000       0.012000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                      Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                    Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Horizontal Ellipse Concrete: Square edge with headwall

Downstream FHWA Inlet Edge Description:
Horizontal Ellipse Concrete: Square edge with headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
PIPE ALONG WEST SIDE OF KIRKMAN RD

```
----------------------------------------------------------------------------------------------------
         Name: CC-DOT3            From Node: DOT-3           Length(ft): 172.00
        Group: UNIV                 To Node: HOLIDAY              Count: 1
                                                       Friction Equation: Average Conveyance
             UPSTREAM       DOWNSTREAM                Solution Algorithm: Automatic
     Geometry: Circular       Circular                              Flow: Both
     Span(in): 42.00          42.00                   Entrance Loss Coef: 0.50
     Rise(in): 42.00          42.00                       Exit Loss Coef: 1.00
   Invert(ft): 95.010         94.480                      Bend Loss Coef: 0.00
  Manning's N: 0.012000       0.012000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                      Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                    Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
42" RCP UNDER KIRKMAN ROAD

NOTE: ENTRANCE LOSSES REDUCED BY INWOOD.

```
----------------------------------------------------------------------------------------------------
         Name: CC-E2              From Node: POND-E2         Length(ft): 203.00
        Group: UNIV                 To Node: WEIR-E2              Count: 1
                                                       Friction Equation: Average Conveyance
             UPSTREAM       DOWNSTREAM                Solution Algorithm: Automatic
     Geometry: Circular       Circular                              Flow: Both
     Span(in): 36.00          36.00                   Entrance Loss Coef: 0.70
     Rise(in): 36.00          36.00                       Exit Loss Coef: 1.00
   Invert(ft): 91.500         105.820                     Bend Loss Coef: 0.60
  Manning's N: 0.012000       0.012000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                      Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                    Stabilizer Option: None
```

```
Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE BETWEEN POND 'E2' AND CONTROL STRUCTURE

----------------------------------------------------------------------------------------------------
         Name: CC-F               From Node: NODE-F            Length(ft): 535.00
        Group: UNIV                 To Node: NODE-D3                Count: 1
                                                         Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM                 Solution Algorithm: Automatic
     Geometry: Circular      Circular                                 Flow: Both
     Span(in): 48.00         48.00                      Entrance Loss Coef: 0.70
     Rise(in): 48.00         48.00                          Exit Loss Coef: 0.00
   Invert(ft): 92.000        90.150                         Bend Loss Coef: 1.20
  Manning's N: 0.012000      0.012000                     Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                         Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                       Stabilizer Option: None


Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE BETWEEN NODE 'F' AND NODE 'D3'

----------------------------------------------------------------------------------------------------
         Name: CC-G2              From Node: NODE-G2           Length(ft): 580.00
        Group: UNIV                 To Node: POND-F1                Count: 2
                                                         Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM                 Solution Algorithm: Automatic
     Geometry: Circular      Circular                                 Flow: Both
     Span(in): 48.00         48.00                      Entrance Loss Coef: 0.50
     Rise(in): 48.00         48.00                          Exit Loss Coef: 1.00
   Invert(ft): 103.950       97.000                         Bend Loss Coef: 2.30
  Manning's N: 0.012000      0.012000                     Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                         Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                       Stabilizer Option: None


Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

BASIN 'G2' OUTFALL PIPE UNDER I-4 CONNECTOR ROAD

----------------------------------------------------------------------------------------------------
         Name: CC-H1              From Node: NODE-H1           Length(ft): 1045.00
        Group: UNIV                 To Node: NODE-D3                Count: 1
                                                         Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM                 Solution Algorithm: Automatic
     Geometry: Circular      Circular                                 Flow: Both
     Span(in): 48.00         48.00                      Entrance Loss Coef: 0.50
     Rise(in): 48.00         48.00                          Exit Loss Coef: 0.00
   Invert(ft): 97.300        95.800                         Bend Loss Coef: 2.40
  Manning's N: 0.011000      0.011000                     Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                         Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                       Stabilizer Option: None


Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall
```

```
------------------------------------------------------------------------------------------------------
         Name: CC-I               From Node: POND-I            Length(ft): 86.00
        Group: UNIV                 To Node: WEIR-I                 Count: 1
                                                         Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM                 Solution Algorithm: Automatic
     Geometry: Circular      Circular                                 Flow: Both
     Span(in): 48.00         48.00                      Entrance Loss Coef: 0.50
     Rise(in): 48.00         48.00                          Exit Loss Coef: 1.00
   Invert(ft): 91.000        100.050                        Bend Loss Coef: 0.60
  Manning's N: 0.012000      0.012000                     Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                         Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                       Stabilizer Option: None


Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
PIPE BETWEEN POND 'I' AND CONTROL STRUCTURE

------------------------------------------------------------------------------------------------------
         Name: CC-IOA             From Node: IOA               Length(ft): 1160.00
        Group: UNIV                 To Node: POND-D                 Count: 1
                                                         Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM                 Solution Algorithm: Automatic
     Geometry: Circular      Circular                                 Flow: Both
     Span(in): 84.00         84.00                      Entrance Loss Coef: 0.50
     Rise(in): 84.00         84.00                          Exit Loss Coef: 1.00
   Invert(ft): 82.190        82.300                         Bend Loss Coef: 2.80
  Manning's N: 0.011000      0.011000                     Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                         Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                       Stabilizer Option: None


Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE FROM IOA MANHOLE DMH-HW14 TO POND 'D'

------------------------------------------------------------------------------------------------------
         Name: CC-OVER            From Node: OVERFLOW          Length(ft): 290.00
        Group: UNIV                 To Node: DCS-3                  Count: 1
                                                         Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM                 Solution Algorithm: Automatic
     Geometry: Circular      Circular                                 Flow: Both
     Span(in): 54.00         54.00                      Entrance Loss Coef: 0.60
     Rise(in): 54.00         54.00                          Exit Loss Coef: 1.00
   Invert(ft): 86.070        85.680                         Bend Loss Coef: 0.00
  Manning's N: 0.012000      0.012000                     Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                         Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                       Stabilizer Option: None


Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE FROM EMERGENCY OVERFLOW TO DCS-3

------------------------------------------------------------------------------------------------------
         Name: CC-SPG             From Node: SPG               Length(ft): 400.00
```

```
        Group: UNIV                  To Node: DCS-3                    Count: 1
                                                          Friction Equation: Average Conveyance
             UPSTREAM       DOWNSTREAM                   Solution Algorithm: Automatic
     Geometry: Circular      Circular                                   Flow: Both
     Span(in): 60.00         60.00                       Entrance Loss Coef: 0.60
     Rise(in): 60.00         60.00                           Exit Loss Coef: 1.00
   Invert(ft): 85.660        85.300                          Bend Loss Coef: 0.70
  Manning's N: 0.011000      0.011000                     Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                         Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                       Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

OUTFALL PIPE FROM DCI-UB17 NORTHWARD TO DCS-3

```
----------------------------------------------------------------------------------------------------
         Name: CC_G1               From Node: NODE-G1             Length(ft): 303.00
        Group: UNIV                  To Node: POND-F1                  Count: 1
                                                          Friction Equation: Automatic
             UPSTREAM       DOWNSTREAM                   Solution Algorithm: Most Restrictive
     Geometry: Circular      Circular                                   Flow: Both
     Span(in): 42.00         42.00                       Entrance Loss Coef: 0.50
     Rise(in): 42.00         42.00                           Exit Loss Coef: 1.00
   Invert(ft): 108.520       97.990                          Bend Loss Coef: 1.10
  Manning's N: 0.012000      0.012000                     Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                         Inlet Ctrl Spec: Use dc
 Bot Clip(in): 0.000         0.000                       Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

```
----------------------------------------------------------------------------------------------------
         Name: CSF2_OUT            From Node: D260                Length(ft): 2500.00
        Group: UNIV                  To Node: NODE-G1                  Count: 1
                                                          Friction Equation: Automatic
             UPSTREAM       DOWNSTREAM                   Solution Algorithm: Most Restrictive
     Geometry: Circular      Circular                                   Flow: Both
     Span(in): 36.00         36.00                       Entrance Loss Coef: 0.00
     Rise(in): 36.00         36.00                           Exit Loss Coef: 1.00
   Invert(ft): 133.360       117.000                         Bend Loss Coef: 0.00
  Manning's N: 0.012000      0.012000                     Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                         Inlet Ctrl Spec: Use dc
 Bot Clip(in): 0.000         0.000                       Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

```
----------------------------------------------------------------------------------------------------
         Name: EQUALIZE            From Node: 300                 Length(ft): 191.00
        Group: UNIV                  To Node: 400                      Count: 1
                                                          Friction Equation: Average Conveyance
             UPSTREAM       DOWNSTREAM                   Solution Algorithm: Automatic
     Geometry: Circular      Circular                                   Flow: Both
     Span(in): 30.00         30.00                       Entrance Loss Coef: 0.50
     Rise(in): 30.00         30.00                           Exit Loss Coef: 1.00
   Invert(ft): 95.000        95.000                          Bend Loss Coef: 0.00
```

```
  Manning's N: 0.013000       0.013000                    Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                        Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                      Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER SYSTEM 8/26/99
***********ORIGINAL PERMIT COMMENT************
GREINER'S SYSTEM

```
----------------------------------------------------------------------------------------------------
         Name: G1_OVERFLOW         From Node: NODE-G1           Length(ft): 500.00
        Group: UNIV                  To Node: POND-F1                Count: 1
                                                         Friction Equation: Automatic
               UPSTREAM       DOWNSTREAM                Solution Algorithm: Most Restrictive
     Geometry: Circular       Circular                                Flow: Both
     Span(in): 72.00          72.00                     Entrance Loss Coef: 0.00
     Rise(in): 72.00          72.00                         Exit Loss Coef: 1.00
   Invert(ft): 106.000        98.000                        Bend Loss Coef: 0.00
  Manning's N: 0.012000       0.012000                    Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                        Inlet Ctrl Spec: Use dc
 Bot Clip(in): 0.000          0.000                      Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

```
----------------------------------------------------------------------------------------------------
         Name: HILTON_NR1          From Node: HILTON_N10        Length(ft): 25.00
        Group: UNIV                  To Node: HILTON_N20             Count: 1
                                                         Friction Equation: Average Conveyance
               UPSTREAM       DOWNSTREAM                Solution Algorithm: Automatic
     Geometry: Circular       Circular                                Flow: Both
     Span(in): 12.00          12.00                     Entrance Loss Coef: 0.50
     Rise(in): 12.00          12.00                         Exit Loss Coef: 1.00
   Invert(ft): 98.500         98.500                        Bend Loss Coef: 0.00
  Manning's N: 0.012000       0.012000                    Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                        Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                      Stabilizer Option: None
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM AMERICAN WAY HILTON PERMIT (MARCH, 2001)
***********ORIGINAL PERMIT COMMENT************
NORTH BASIN OFFLINE PIPE FROM C.S. TO W.Q. POND

```
----------------------------------------------------------------------------------------------------
         Name: HILTON_NR4          From Node: HILTON_N20        Length(ft): 30.00
        Group: UNIV                  To Node: DS18A                  Count: 1
                                                         Friction Equation: Average Conveyance
               UPSTREAM       DOWNSTREAM                Solution Algorithm: Automatic
     Geometry: Circular       Circular                                Flow: Both
     Span(in): 3.00           3.00                      Entrance Loss Coef: 0.50
     Rise(in): 3.00           3.00                          Exit Loss Coef: 1.00
   Invert(ft): 98.500         98.500                        Bend Loss Coef: 0.00
  Manning's N: 0.012000       0.012000                    Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                        Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                      Stabilizer Option: None
```

```
Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM AMERICAN WAY HILTON PERMIT (MARCH, 2001)
***********ORIGINAL PERMIT COMMENT************
NORTH BASIN W.Q. DRY POND BLEEDER PIPE

----------------------------------------------------------------------------------------------------
         Name: HILTON_SR1          From Node: HILTON_SN10        Length(ft): 25.00
        Group: UNIV                  To Node: HILTON_SN20             Count: 1
                                                          Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM                  Solution Algorithm: Automatic
     Geometry: Circular      Circular                                  Flow: Both
     Span(in): 6.00          6.00                        Entrance Loss Coef: 0.50
     Rise(in): 6.00          6.00                            Exit Loss Coef: 1.00
   Invert(ft): 103.500       103.500                         Bend Loss Coef: 0.00
  Manning's N: 0.012000      0.012000                      Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                          Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                         Stabilizer Option: None



Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM AMERICAN WAY HILTON PERMIT (MARCH, 2001)
***********ORIGINAL PERMIT COMMENT************
SOUTH BASIN OFFLINE PIPE FROM C.S. TO W.Q. POND

----------------------------------------------------------------------------------------------------
         Name: MOTEL6_BLEEDER      From Node: MOTEL6_POND1       Length(ft): 50.00
        Group: UNIV                  To Node: MOTEL6_POND2            Count: 1
                                                          Friction Equation: Average Conveyance
              UPSTREAM       DOWNSTREAM                  Solution Algorithm: Automatic
     Geometry: Circular      Circular                                  Flow: Both
     Span(in): 3.00          3.00                        Entrance Loss Coef: 0.50
     Rise(in): 3.00          3.00                            Exit Loss Coef: 1.00
   Invert(ft): 100.000       99.500                          Bend Loss Coef: 0.00
  Manning's N: 0.010000      0.010000                      Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                          Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                         Stabilizer Option: None



Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PIPE DATA REFERENCED FROM MOTEL 6 PERMIT - JANUARY 2002
***********ORIGINAL PERMIT COMMENT************
3" BLEEDER ORIFICE IN POND #1

==========================================================================================
==== Channels ============================================================================
==========================================================================================

          Name: 15-18              From Node: US15               Length(ft): 1600.00
         Group: UNIV                 To Node: US18                    Count: 1

               UPSTREAM       DOWNSTREAM                  Friction Equation: Average Conveyance
      Geometry: Trapezoidal    Trapezoidal               Solution Algorithm: Automatic
    Invert(ft): 104.000        97.100                                  Flow: Both
 TClpInitZ(ft): 99999.000      99999.000                   Contraction Coef: 0.300
   Manning's N: 0.040000       0.040000                      Expansion Coef: 0.700
  Top Clip(ft): 0.000          0.000                     Entrance Loss Coef: 0.000
```

```
  Bot Clip(ft): 0.000          0.000                          Exit Loss Coef: 0.000
     Main XSec:                                             Outlet Ctrl Spec: Use dc or tw
  AuxElev1(ft):                                              Inlet Ctrl Spec: Use dn
     Aux XSec1:                                            Stabilizer Option: None
  AuxElev2(ft):
     Aux XSec2:
 Top Width(ft):
     Depth(ft):
 Bot Width(ft): 5.000          5.000
  LtSdSlp(h/v): 6.00           6.00
  RtSdSlp(h/v): 6.00           6.00

CHANNEL DATA REFERENCE FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
GREINER'S SYSTEM

NOTE: EXIT LOSS REDUCED TO 0 BY INWOOD.

----------------------------------------------------------------------------------------------------
          Name: 18-22              From Node: US18              Length(ft): 1450.00
         Group: UNIV                 To Node: US22                   Count: 1

               UPSTREAM       DOWNSTREAM                    Friction Equation: Average Conveyance
      Geometry: Trapezoidal    Trapezoidal                 Solution Algorithm: Automatic
    Invert(ft): 100.600        95.100                                    Flow: Both
 TClpInitZ(ft): 99999.000      99999.000                     Contraction Coef: 0.300
   Manning's N: 0.040000       0.040000                        Expansion Coef: 0.700
  Top Clip(ft): 0.000          0.000                      Entrance Loss Coef: 0.000
  Bot Clip(ft): 0.000          0.000                          Exit Loss Coef: 0.000
     Main XSec:                                             Outlet Ctrl Spec: Use dc or tw
  AuxElev1(ft):                                              Inlet Ctrl Spec: Use dn
     Aux XSec1:                                            Stabilizer Option: None
  AuxElev2(ft):
     Aux XSec2:
 Top Width(ft):
     Depth(ft):
 Bot Width(ft): 5.000          5.000
  LtSdSlp(h/v): 6.00           6.00
  RtSdSlp(h/v): 4.00           4.00

CHANNEL DATA REFERENCE FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
GREINER'S SYSTEM

NOTE: EXIT LOSS REDUCED TO 0 BY INWOOD.

----------------------------------------------------------------------------------------------------
          Name: 18A-20             From Node: DS18A             Length(ft): 1750.00
         Group: UNIV                 To Node: US20                   Count: 1

               UPSTREAM       DOWNSTREAM                    Friction Equation: Average Conveyance
      Geometry: Trapezoidal    Trapezoidal                 Solution Algorithm: Automatic
    Invert(ft): 95.200         94.650                                    Flow: Both
 TClpInitZ(ft): 99999.000      99999.000                     Contraction Coef: 0.300
   Manning's N: 0.040000       0.040000                        Expansion Coef: 0.700
  Top Clip(ft): 0.000          0.000                      Entrance Loss Coef: 0.000
  Bot Clip(ft): 0.000          0.000                          Exit Loss Coef: 0.000
     Main XSec:                                             Outlet Ctrl Spec: Use dc or tw
  AuxElev1(ft):                                              Inlet Ctrl Spec: Use dn
     Aux XSec1:                                            Stabilizer Option: None
  AuxElev2(ft):
     Aux XSec2:
 Top Width(ft):
     Depth(ft):
 Bot Width(ft): 10.000         10.000
  LtSdSlp(h/v): 6.00           6.00
  RtSdSlp(h/v): 6.00           6.00

CHANNEL DATA REFERENCE FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
GREINER'S SYSTEM

----------------------------------------------------------------------------------------------------
```

```
         Name: 20-21             From Node: DS20           Length(ft): 700.00
        Group: UNIV                To Node: DS21                Count: 1

               UPSTREAM       DOWNSTREAM              Friction Equation: Average Conveyance
     Geometry: Trapezoidal    Trapezoidal            Solution Algorithm: Automatic
   Invert(ft): 94.140         93.400                               Flow: Both
 TClpInitZ(ft): 99999.000      99999.000               Contraction Coef: 0.300
   Manning's N: 0.040000       0.040000                  Expansion Coef: 0.700
  Top Clip(ft): 0.000          0.000                 Entrance Loss Coef: 0.000
  Bot Clip(ft): 0.000          0.000                     Exit Loss Coef: 0.000
     Main XSec:                                        Outlet Ctrl Spec: Use dc or tw
  AuxElev1(ft):                                         Inlet Ctrl Spec: Use dn
     Aux XSec1:                                       Stabilizer Option: None
  AuxElev2(ft):
     Aux XSec2:
 Top Width(ft):
     Depth(ft):
 Bot Width(ft): 5.000          5.000
  LtSdSlp(h/v): 4.00           4.00
  RtSdSlp(h/v): 4.00           4.00

CHANNEL DATA REFERENCE FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
GREINER'S SYSTEM

----------------------------------------------------------------------------------------------------
         Name: 200-OUT           From Node: 200-OUT        Length(ft): 780.00
        Group: UNIV                To Node: US15                Count: 1

               UPSTREAM       DOWNSTREAM              Friction Equation: Average Conveyance
     Geometry: Trapezoidal    Trapezoidal            Solution Algorithm: Automatic
   Invert(ft): 107.300        102.100                              Flow: Both
 TClpInitZ(ft): 99999.000      99999.000               Contraction Coef: 0.300
   Manning's N: 0.040000       0.040000                  Expansion Coef: 0.700
  Top Clip(ft): 0.000          0.000                 Entrance Loss Coef: 0.000
  Bot Clip(ft): 0.000          0.000                     Exit Loss Coef: 0.000
     Main XSec:                                        Outlet Ctrl Spec: Use dc or tw
  AuxElev1(ft):                                         Inlet Ctrl Spec: Use dn
     Aux XSec1:                                       Stabilizer Option: None
  AuxElev2(ft):
     Aux XSec2:
 Top Width(ft):
     Depth(ft):
 Bot Width(ft): 5.000          5.000
  LtSdSlp(h/v): 4.00           4.00
  RtSdSlp(h/v): 4.00           4.00

CHANNEL DATA REFERENCE FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
GREINER'S SYSTEM

NOTE: EXIT LOSS REDUCED TO 0 BY INWOOD.

----------------------------------------------------------------------------------------------------
         Name: 21-27             From Node: DS21           Length(ft): 1000.00
        Group: UNIV                To Node: DS27                Count: 1

               UPSTREAM       DOWNSTREAM              Friction Equation: Average Conveyance
     Geometry: Trapezoidal    Trapezoidal            Solution Algorithm: Automatic
   Invert(ft): 93.500         92.900                               Flow: Both
 TClpInitZ(ft): 99999.000      99999.000               Contraction Coef: 0.300
   Manning's N: 0.040000       0.040000                  Expansion Coef: 0.700
  Top Clip(ft): 0.000          0.000                 Entrance Loss Coef: 0.000
  Bot Clip(ft): 0.000          0.000                     Exit Loss Coef: 0.000
     Main XSec:                                        Outlet Ctrl Spec: Use dc or tw
  AuxElev1(ft):                                         Inlet Ctrl Spec: Use dn
     Aux XSec1:                                       Stabilizer Option: None
  AuxElev2(ft):
     Aux XSec2:
 Top Width(ft):
     Depth(ft):
 Bot Width(ft): 5.000          5.000
  LtSdSlp(h/v): 4.00           4.00
  RtSdSlp(h/v): 4.00           4.00
```

```
CHANNEL DATA REFERENCE FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
GREINER'S SYSTEM

----------------------------------------------------------------------------------------------------
          Name: 22-23               From Node: US23           Length(ft): 250.00
         Group: UNIV                  To Node: DS22                Count: 1

                UPSTREAM       DOWNSTREAM                Friction Equation: Automatic
      Geometry: Trapezoidal    Trapezoidal              Solution Algorithm: Automatic
    Invert(ft): 94.980         95.730                                 Flow: Both
 TClpInitZ(ft): 99999.000      99999.000                  Contraction Coef: 0.300
   Manning's N: 0.040000       0.040000                     Expansion Coef: 0.700
  Top Clip(ft): 0.000          0.000                    Entrance Loss Coef: 0.000
  Bot Clip(ft): 0.000          0.000                        Exit Loss Coef: 0.000
     Main XSec:                                          Outlet Ctrl Spec: Use dc or tw
  AuxElev1(ft):                                           Inlet Ctrl Spec: Use dn
     Aux XSec1:                                          Stabilizer Option: None
  AuxElev2(ft):
     Aux XSec2:
 Top Width(ft):
     Depth(ft):
 Bot Width(ft): 10.000         10.000
  LtSdSlp(h/v): 5.00           5.00
  RtSdSlp(h/v): 4.00           4.00

CHANNEL DATA REFERENCE FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
GREINER'S SYSTEM

NOTE: EXIT LOSS REDUCED TO 0 BY INWOOD.

----------------------------------------------------------------------------------------------------
          Name: 23-30               From Node: DS23           Length(ft): 1750.00
         Group: UNIV                  To Node: US30-32             Count: 1

                UPSTREAM       DOWNSTREAM                Friction Equation: Automatic
      Geometry: Trapezoidal    Trapezoidal              Solution Algorithm: Automatic
    Invert(ft): 95.300         94.400                                 Flow: Both
 TClpInitZ(ft): 99999.000      99999.000                  Contraction Coef: 0.300
   Manning's N: 0.040000       0.040000                     Expansion Coef: 0.700
  Top Clip(ft): 0.000          0.000                    Entrance Loss Coef: 0.000
  Bot Clip(ft): 0.000          0.000                        Exit Loss Coef: 0.000
     Main XSec:                                          Outlet Ctrl Spec: Use dc or tw
  AuxElev1(ft):                                           Inlet Ctrl Spec: Use dn
     Aux XSec1:                                          Stabilizer Option: None
  AuxElev2(ft):
     Aux XSec2:
 Top Width(ft):
     Depth(ft):
 Bot Width(ft): 5.000          5.000
  LtSdSlp(h/v): 4.00           4.00
  RtSdSlp(h/v): 3.00           3.00

CHANNEL DATA REFERENCE FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
FDOT R/W SWALE NORTHWARD TO MAIN OUTFALL

NOTE: EXIT LOSS REDUCED TO 0 BY INWOOD.

----------------------------------------------------------------------------------------------------
          Name: 26-31               From Node: DS26           Length(ft): 1450.00
         Group: UNIV                  To Node: US31                Count: 1

                UPSTREAM       DOWNSTREAM                Friction Equation: Average Conveyance
      Geometry: Trapezoidal    Trapezoidal              Solution Algorithm: Automatic
    Invert(ft): 96.370         94.160                                 Flow: Both
 TClpInitZ(ft): 99999.000      99999.000                  Contraction Coef: 0.300
   Manning's N: 0.040000       0.040000                     Expansion Coef: 0.700
  Top Clip(ft): 0.000          0.000                    Entrance Loss Coef: 0.000
  Bot Clip(ft): 0.000          0.000                        Exit Loss Coef: 0.000
     Main XSec:                                          Outlet Ctrl Spec: Use dc or tw
```

```
  AuxElev1(ft):                                             Inlet Ctrl Spec: Use dn
     Aux XSec1:                                           Stabilizer Option: None
  AuxElev2(ft):
     Aux XSec2:
 Top Width(ft):
     Depth(ft):
 Bot Width(ft): 5.000          5.000
  LtSdSlp(h/v): 6.00           6.00
  RtSdSlp(h/v): 6.00           6.00
```

CHANNEL DATA REFERENCE FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
GREINER'S SYSTEM

NOTE: EXIT LOSS REDUCED TO 0 BY INWOOD.

```
----------------------------------------------------------------------------------------------------
          Name: 27-34              From Node: DS27            Length(ft): 2000.00
         Group: UNIV                 To Node: DS34                 Count: 1

               UPSTREAM       DOWNSTREAM                 Friction Equation: Average Conveyance
      Geometry: Trapezoidal    Trapezoidal              Solution Algorithm: Automatic
    Invert(ft): 92.900         92.300                                 Flow: Both
 TClpInitZ(ft): 99999.000      99999.000                  Contraction Coef: 0.300
   Manning's N: 0.040000       0.040000                     Expansion Coef: 0.700
  Top Clip(ft): 0.000          0.000                    Entrance Loss Coef: 0.000
  Bot Clip(ft): 0.000          0.000                        Exit Loss Coef: 0.000
     Main XSec:                                           Outlet Ctrl Spec: Use dc or tw
  AuxElev1(ft):                                            Inlet Ctrl Spec: Use dn
     Aux XSec1:                                          Stabilizer Option: None
  AuxElev2(ft):
     Aux XSec2:
 Top Width(ft):
     Depth(ft):
 Bot Width(ft): 5.000          5.000
  LtSdSlp(h/v): 4.00           4.00
  RtSdSlp(h/v): 4.00           4.00
```

CHANNEL DATA REFERENCE FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
GREINER'S SYSTEM

```
----------------------------------------------------------------------------------------------------
          Name: 29-35              From Node: DS29            Length(ft): 715.00
         Group: UNIV                 To Node: US35-36              Count: 1

               UPSTREAM       DOWNSTREAM                 Friction Equation: Average Conveyance
      Geometry: Trapezoidal    Trapezoidal              Solution Algorithm: Automatic
    Invert(ft): 92.630         91.690                                 Flow: Both
 TClpInitZ(ft): 99999.000      99999.000                  Contraction Coef: 0.300
   Manning's N: 0.040000       0.040000                     Expansion Coef: 0.700
  Top Clip(ft): 0.000          0.000                    Entrance Loss Coef: 0.000
  Bot Clip(ft): 0.000          0.000                        Exit Loss Coef: 0.000
     Main XSec:                                           Outlet Ctrl Spec: Use dc or tw
  AuxElev1(ft):                                            Inlet Ctrl Spec: Use dn
     Aux XSec1:                                          Stabilizer Option: None
  AuxElev2(ft):
     Aux XSec2:
 Top Width(ft):
     Depth(ft):
 Bot Width(ft): 5.000          5.000
  LtSdSlp(h/v): 4.00           4.00
  RtSdSlp(h/v): 4.00           4.00
```

CHANNEL DATA REFERENCE FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
GREINER'S SYSTEM

NOTE: EXIT LOSS REDUCED TO 0 BY INWOOD.

```
----------------------------------------------------------------------------------------------------
          Name: 30-29              From Node: DS30-32         Length(ft): 990.00
         Group: UNIV                 To Node: DS29                 Count: 1
```

```
               UPSTREAM       DOWNSTREAM                 Friction Equation: Average Conveyance
      Geometry: Trapezoidal    Trapezoidal               Solution Algorithm: Automatic
    Invert(ft): 93.690         92.630                                  Flow: Both
 TClpInitZ(ft): 99999.000      99999.000                   Contraction Coef: 0.300
   Manning's N: 0.040000       0.040000                      Expansion Coef: 0.700
  Top Clip(ft): 0.000          0.000                     Entrance Loss Coef: 0.000
  Bot Clip(ft): 0.000          0.000                         Exit Loss Coef: 0.000
     Main XSec:                                            Outlet Ctrl Spec: Use dc or tw
  AuxElev1(ft):                                             Inlet Ctrl Spec: Use dn
     Aux XSec1:                                            Stabilizer Option: None
  AuxElev2(ft):
     Aux XSec2:
 Top Width(ft):
     Depth(ft):
 Bot Width(ft): 5.000          5.000
  LtSdSlp(h/v): 4.00           4.00
  RtSdSlp(h/v): 4.00           4.00
```

CHANNEL DATA REFERENCE FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
GREINER'S SYSTEM

```
----------------------------------------------------------------------------------------------------
          Name: 34-35              From Node: DS34               Length(ft): 100.00
         Group: UNIV                 To Node: DS35-36                 Count: 1

               UPSTREAM       DOWNSTREAM                 Friction Equation: Average Conveyance
      Geometry: Trapezoidal    Trapezoidal               Solution Algorithm: Automatic
    Invert(ft): 92.300         91.940                                  Flow: Both
 TClpInitZ(ft): 99999.000      99999.000                   Contraction Coef: 0.300
   Manning's N: 0.040000       0.040000                      Expansion Coef: 0.700
  Top Clip(ft): 0.000          0.000                     Entrance Loss Coef: 0.000
  Bot Clip(ft): 0.000          0.000                         Exit Loss Coef: 0.000
     Main XSec:                                            Outlet Ctrl Spec: Use dc or tw
  AuxElev1(ft):                                             Inlet Ctrl Spec: Use dn
     Aux XSec1:                                            Stabilizer Option: None
  AuxElev2(ft):
     Aux XSec2:
 Top Width(ft):
     Depth(ft):
 Bot Width(ft): 5.000          5.000
  LtSdSlp(h/v): 4.00           4.00
  RtSdSlp(h/v): 4.00           4.00
```

CHANNEL DATA REFERENCE FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
GREINER'S SYSTEM
****
NOTE: CHANNEL LENGTH REVISED BY INWOOD TO REFLECT EXISTING CONDITIONS
NOTE: EXIT LOSS REDUCED TO 0 BY INWOOD.

```
----------------------------------------------------------------------------------------------------
          Name: C_SUNIV_SFCN       From Node: DS35-36            Length(ft): 957.00
         Group: UNIV                 To Node: I4-FCTR03               Count: 1

               UPSTREAM       DOWNSTREAM                 Friction Equation: Average Conveyance
      Geometry: Trapezoidal    Trapezoidal               Solution Algorithm: Automatic
    Invert(ft): 91.940         90.260                                  Flow: Both
 TClpInitZ(ft): 99999.000      99999.000                   Contraction Coef: 0.300
   Manning's N: 0.040000       0.040000                      Expansion Coef: 0.700
  Top Clip(ft): 0.000          0.000                     Entrance Loss Coef: 0.000
  Bot Clip(ft): 0.000          0.000                         Exit Loss Coef: 0.000
     Main XSec:                                            Outlet Ctrl Spec: Use dc or tw
  AuxElev1(ft):                                             Inlet Ctrl Spec: Use dn
     Aux XSec1:                                            Stabilizer Option: None
  AuxElev2(ft):
     Aux XSec2:
 Top Width(ft):
     Depth(ft):
 Bot Width(ft): 5.000          5.000
  LtSdSlp(h/v): 4.00           4.00
  RtSdSlp(h/v): 4.00           4.00
```

CHANNEL INVERT AND GEOMETRY DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99.

```
==================================================================================
==== Drop Structures =============================================================
==================================================================================

        Name: 15-16              From Node: DS15              Length(ft): 724.00
       Group: UNIV                 To Node: US16                   Count: 1

              UPSTREAM       DOWNSTREAM                 Friction Equation: Average Conveyance
     Geometry: Horz Ellipse   Horz Ellipse             Solution Algorithm: Automatic
     Span(in): 45.00          45.00                                  Flow: Both
     Rise(in): 29.00          29.00                    Entrance Loss Coef: 0.500
   Invert(ft): 97.000         95.740                       Exit Loss Coef: 1.000
  Manning's N: 0.013000       0.013000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                       Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                         Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Horizontal Ellipse Concrete: Square edge with headwall

Downstream FHWA Inlet Edge Description:
Horizontal Ellipse Concrete: Square edge with headwall

DROP STRUCTURE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
GREINER'S SYSTEM
**************NOTE*****************
ENTRANCE LOSS IN PIPE MODIFIED BY INWOOD.

*** Weir 1 of 1 for Drop Structure 15-16 ***
                                                                                      TABLE
                  Count: 1                     Bottom Clip(in): 0.000
                   Type: Horizontal               Top Clip(in): 0.000
                   Flow: Both                   Weir Disc Coef: 3.100
               Geometry: Rectangular          Orifice Disc Coef: 0.600

               Span(in): 50.00                      Invert(ft): 101.800
               Rise(in): 44.00                Control Elev(ft): 101.800


----------------------------------------------------------------------------------------------------
        Name: 18                 From Node: US18              Length(ft): 185.00
       Group: UNIV                 To Node: DS18                   Count: 1

              UPSTREAM       DOWNSTREAM                 Friction Equation: Average Conveyance
     Geometry: Circular       Circular                 Solution Algorithm: Automatic
     Span(in): 24.00          24.00                                  Flow: Both
     Rise(in): 24.00          24.00                    Entrance Loss Coef: 0.500
   Invert(ft): 97.100         96.750                       Exit Loss Coef: 0.000
  Manning's N: 0.013000       0.013000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                       Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                         Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

DROP STRUCTURE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
GREINER'S SYSTEM

*** Weir 1 of 1 for Drop Structure 18 ***
                                                                                      TABLE
                  Count: 1                     Bottom Clip(in): 0.000
                   Type: Horizontal               Top Clip(in): 0.000
                   Flow: Both                   Weir Disc Coef: 3.100
               Geometry: Rectangular          Orifice Disc Coef: 0.600

               Span(in): 50.00                      Invert(ft): 100.600
```

```
               Rise(in): 44.00                  Control Elev(ft): 100.600


----------------------------------------------------------------------------------------------------
         Name: 34                  From Node: US34             Length(ft): 120.00
        Group: UNIV                  To Node: DS34                  Count: 1

               UPSTREAM       DOWNSTREAM               Friction Equation: Average Conveyance
     Geometry: Circular       Circular                Solution Algorithm: Automatic
     Span(in): 30.00          30.00                                 Flow: Both
     Rise(in): 30.00          30.00                   Entrance Loss Coef: 0.500
   Invert(ft): 95.380         95.010                      Exit Loss Coef: 1.000
  Manning's N: 0.013000       0.013000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                      Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                        Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

DROP STRUCTURE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
GREINER'S SYSTEM

*** Weir 1 of 1 for Drop Structure 34 ***
                                                                                   TABLE
                  Count: 1                       Bottom Clip(in): 0.000
                   Type: Horizontal                 Top Clip(in): 0.000
                   Flow: Both                     Weir Disc Coef: 3.100
               Geometry: Rectangular            Orifice Disc Coef: 0.600

               Span(in): 50.00                        Invert(ft): 98.860
               Rise(in): 44.00                  Control Elev(ft): 98.860


----------------------------------------------------------------------------------------------------
         Name: 400                 From Node: 400              Length(ft): 25.00
        Group: UNIV                  To Node: DS17                  Count: 1

               UPSTREAM       DOWNSTREAM               Friction Equation: Average Conveyance
     Geometry: Circular       Circular                Solution Algorithm: Automatic
     Span(in): 30.00          30.00                                 Flow: Both
     Rise(in): 30.00          30.00                   Entrance Loss Coef: 0.500
   Invert(ft): 95.600         95.480                      Exit Loss Coef: 0.000
  Manning's N: 0.013000       0.013000                  Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                      Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                        Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

DROP STRUCTURE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
GREINER'S SYSTEM

*** Weir 1 of 3 for Drop Structure 400 ***
                                                                                   TABLE
                  Count: 1                       Bottom Clip(in): 0.000
                   Type: Vertical: Mavis            Top Clip(in): 0.000
                   Flow: Both                     Weir Disc Coef: 3.100
               Geometry: Circular               Orifice Disc Coef: 0.600

               Span(in): 3.00                         Invert(ft): 96.500
               Rise(in): 3.00                   Control Elev(ft): 96.500

*** Weir 2 of 3 for Drop Structure 400 ***
                                                                                   TABLE
                  Count: 1                       Bottom Clip(in): 0.000
                   Type: Vertical: Mavis            Top Clip(in): 0.000
```

```
                 Flow: Both                   Weir Disc Coef: 3.100
             Geometry: Rectangular          Orifice Disc Coef: 0.600

             Span(in): 4.00                       Invert(ft): 98.000
             Rise(in): 30.00                Control Elev(ft): 98.000

*** Weir 3 of 3 for Drop Structure 400 ***
                                                                                  TABLE
                Count: 1                     Bottom Clip(in): 0.000
                 Type: Horizontal               Top Clip(in): 0.000
                 Flow: Both                   Weir Disc Coef: 3.100
             Geometry: Rectangular          Orifice Disc Coef: 0.600

             Span(in): 54.00                      Invert(ft): 100.500
             Rise(in): 36.00                Control Elev(ft): 100.500


----------------------------------------------------------------------------------------------------
         Name: 500                 From Node: 500              Length(ft): 2050.00
        Group: UNIV                  To Node: DS23                  Count: 1

             UPSTREAM       DOWNSTREAM             Friction Equation: Average Conveyance
     Geometry: Circular       Circular             Solution Algorithm: Automatic
     Span(in): 24.00          24.00                              Flow: Both
     Rise(in): 24.00          24.00                Entrance Loss Coef: 0.500
   Invert(ft): 97.550         95.300                   Exit Loss Coef: 0.000
  Manning's N: 0.012000       0.012000              Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                  Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                    Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

DROP STRUCTURE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
GREINER'S SYSTEM

*** Weir 1 of 2 for Drop Structure 500 ***
                                                                                  TABLE
                Count: 1                     Bottom Clip(in): 0.000
                 Type: Vertical: Mavis          Top Clip(in): 0.000
                 Flow: Both                   Weir Disc Coef: 3.200
             Geometry: Rectangular          Orifice Disc Coef: 0.600

             Span(in): 2.00                       Invert(ft): 99.600
             Rise(in): 9999.00              Control Elev(ft): 99.600

*** Weir 2 of 2 for Drop Structure 500 ***
                                                                                  TABLE
                Count: 1                     Bottom Clip(in): 0.000
                 Type: Vertical: Mavis          Top Clip(in): 0.000
                 Flow: Both                   Weir Disc Coef: 3.200
             Geometry: Rectangular          Orifice Disc Coef: 0.600

             Span(in): 124.00                     Invert(ft): 102.750
             Rise(in): 9999.00              Control Elev(ft): 102.750


----------------------------------------------------------------------------------------------------
         Name: D_AWHOTEL_US20      From Node: AW_HOTEL         Length(ft): 1370.00
        Group: UNIV                  To Node: US20                  Count: 1

             UPSTREAM       DOWNSTREAM             Friction Equation: Average Conveyance
     Geometry: Circular       Circular             Solution Algorithm: Automatic
     Span(in): 18.00          18.00                              Flow: Both
     Rise(in): 18.00          18.00                Entrance Loss Coef: 0.500
   Invert(ft): 99.720         95.480                   Exit Loss Coef: 0.000
  Manning's N: 0.012000       0.012000              Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                  Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                    Solution Incs: 0

Upstream FHWA Inlet Edge Description:
```

```
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

GRATE INLET CONTROL STRUCTURE WITH PIPE.
FROM HOTEL POND TO CULVERT UNDER 1-4.
DROP STRUCTURE AND PIPE DATA ASSUMED FROM FIELD OBSERVATIONS.

*** Weir 1 of 1 for Drop Structure D_AWHOTEL_US20 ***
                                                                                         TABLE
                  Count: 1                      Bottom Clip(in): 0.000
                   Type: Horizontal                Top Clip(in): 0.000
                   Flow: Both                    Weir Disc Coef: 3.200
               Geometry: Rectangular           Orifice Disc Coef: 0.600

               Span(in): 23.00                        Invert(ft): 103.000
               Rise(in): 22.00                  Control Elev(ft): 103.000


----------------------------------------------------------------------------------------------------
         Name: D_HILTON_US20       From Node: HILTON_SN30        Length(ft): 1878.00
        Group: UNIV                  To Node: US20                    Count: 1

               UPSTREAM       DOWNSTREAM                  Friction Equation: Average Conveyance
     Geometry: Circular       Circular                   Solution Algorithm: Automatic
     Span(in): 24.00          24.00                                    Flow: Both
     Rise(in): 24.00          24.00                      Entrance Loss Coef: 0.500
   Invert(ft): 102.500        95.480                         Exit Loss Coef: 1.000
  Manning's N: 0.012000       0.012000                    Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                        Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                          Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

DROP STRUCTURE DATA REFERENCED FROM AMERICAN WAY HILTON PERMIT
************ORIGINAL PERMIT COMMENT ******************
SOUTH BASIN ATTENUATION POND CONTROL STRUCTURE

*** Weir 1 of 2 for Drop Structure D_HILTON_US20 ***
                                                                                         TABLE
                  Count: 1                      Bottom Clip(in): 0.000
                   Type: Vertical: Mavis           Top Clip(in): 0.000
                   Flow: Both                    Weir Disc Coef: 3.130
               Geometry: Rectangular           Orifice Disc Coef: 0.600

               Span(in): 49.00                        Invert(ft): 104.500
               Rise(in): 999.00                 Control Elev(ft): 103.500

*** Weir 2 of 2 for Drop Structure D_HILTON_US20 ***
                                                                                         TABLE
                  Count: 1                      Bottom Clip(in): 0.000
                   Type: Vertical: Mavis           Top Clip(in): 0.000
                   Flow: Both                    Weir Disc Coef: 3.130
               Geometry: Circular              Orifice Disc Coef: 0.600

               Span(in): 10.00                        Invert(ft): 102.500
               Rise(in): 10.00                  Control Elev(ft): 102.500


----------------------------------------------------------------------------------------------------
         Name: D_SUPER8            From Node: SUPER8_POND        Length(ft): 50.00
        Group: UNIV                  To Node: US20                    Count: 1

               UPSTREAM       DOWNSTREAM                  Friction Equation: Average Conveyance
     Geometry: Horz Ellipse   Horz Ellipse               Solution Algorithm: Automatic
     Span(in): 38.00          38.00                                    Flow: Both
     Rise(in): 24.00          24.00                      Entrance Loss Coef: 0.500
   Invert(ft): 98.700         98.000                         Exit Loss Coef: 0.000
  Manning's N: 0.012000       0.012000                    Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                        Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                          Solution Incs: 0
```

```
Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

DROP STRUCTURE DATA REFERENCED SUPER 8 HOTEL PERMIT


*** Weir 1 of 2 for Drop Structure D_SUPER8 ***
                                                                                         TABLE
                  Count: 1                      Bottom Clip(ft): 0.000
                   Type: Vertical: Mavis           Top Clip(ft): 0.000
                   Flow: Both                    Weir Disc Coef: 3.200
               Geometry: Trapezoidal          Orifice Disc Coef: 0.600

       Bottom Width(ft): 0.00                        Invert(ft): 98.700
       Left Sd Slp(h/v): 0.09                  Control Elev(ft): 98.700
      Right Sd Slp(h/v): 0.09            Struct Opening Dim(ft): 1.93

*** Weir 2 of 2 for Drop Structure D_SUPER8 ***
                                                                                         TABLE
                  Count: 1                      Bottom Clip(in): 0.000
                   Type: Vertical: Mavis           Top Clip(in): 0.000
                   Flow: Both                    Weir Disc Coef: 3.200
               Geometry: Rectangular          Orifice Disc Coef: 0.600

               Span(in): 72.00                       Invert(ft): 100.630
               Rise(in): 48.36                 Control Elev(ft): 100.630


----------------------------------------------------------------------------------------------------
         Name: DS-2              From Node: DCS-2            Length(ft): 1190.00
        Group: UNIV                To Node: DCS-7                 Count: 1

               UPSTREAM       DOWNSTREAM              Friction Equation: Average Conveyance
      Geometry: Circular       Circular              Solution Algorithm: Automatic
      Span(in): 48.00          60.00                               Flow: Both
      Rise(in): 48.00          60.00                 Entrance Loss Coef: 2.800
    Invert(ft): 84.420         85.550                    Exit Loss Coef: 1.000
   Manning's N: 0.012000       0.012000                Outlet Ctrl Spec: Use dc or tw
  Top Clip(in): 0.000          0.000                    Inlet Ctrl Spec: Use dn
  Bot Clip(in): 0.000          0.000                     Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

CONTROL STRUCTURE DCS-2

*** Weir 1 of 2 for Drop Structure DS-2 ***
                                                                                         TABLE
                  Count: 1                      Bottom Clip(in): 0.000
                   Type: Vertical: Mavis           Top Clip(in): 0.000
                   Flow: Both                    Weir Disc Coef: 3.100
               Geometry: Rectangular          Orifice Disc Coef: 0.600

               Span(in): 20.00                       Invert(ft): 96.000
               Rise(in): 14.40                 Control Elev(ft): 96.000

*** Weir 2 of 2 for Drop Structure DS-2 ***
                                                                                         TABLE
                  Count: 1                      Bottom Clip(in): 0.000
                   Type: Vertical: Mavis           Top Clip(in): 0.000
                   Flow: Both                    Weir Disc Coef: 3.100
               Geometry: Rectangular          Orifice Disc Coef: 0.600

               Span(in): 72.00                       Invert(ft): 97.200
               Rise(in): 120.00                Control Elev(ft): 97.200


----------------------------------------------------------------------------------------------------
         Name: DS-200            From Node: 200              Length(ft): 342.00
```

```
        Group: UNIV                  To Node: 200-OUT                  Count: 1

              UPSTREAM       DOWNSTREAM                  Friction Equation: Average Conveyance
     Geometry: Circular      Circular                   Solution Algorithm: Automatic
     Span(in): 30.00         30.00                                    Flow: Both
     Rise(in): 30.00         30.00                      Entrance Loss Coef: 0.500
   Invert(ft): 107.700       107.300                        Exit Loss Coef: 0.000
  Manning's N: 0.013000      0.013000                     Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                         Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                          Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

DROP STRUCTURE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
GREINER'S SYSTEM

*** Weir 1 of 3 for Drop Structure DS-200 ***
                                                                                   TABLE
                 Count: 1                      Bottom Clip(in): 0.000
                  Type: Vertical: Mavis           Top Clip(in): 0.000
                  Flow: Both                    Weir Disc Coef: 3.100
              Geometry: Circular              Orifice Disc Coef: 3.100

              Span(in): 3.00                        Invert(ft): 108.000
              Rise(in): 3.00                  Control Elev(ft): 108.000

*** Weir 2 of 3 for Drop Structure DS-200 ***
                                                                                   TABLE
                 Count: 1                      Bottom Clip(in): 0.000
                  Type: Horizontal                Top Clip(in): 0.000
                  Flow: Both                    Weir Disc Coef: 3.100
              Geometry: Rectangular           Orifice Disc Coef: 0.600

              Span(in): 54.00                       Invert(ft): 112.500
              Rise(in): 36.00                 Control Elev(ft): 112.500

*** Weir 3 of 3 for Drop Structure DS-200 ***
                                                                                   TABLE
                 Count: 1                      Bottom Clip(in): 0.000
                  Type: Vertical: Mavis           Top Clip(in): 0.000
                  Flow: Both                    Weir Disc Coef: 3.100
              Geometry: Rectangular           Orifice Disc Coef: 0.600

              Span(in): 10.00                       Invert(ft): 109.700
              Rise(in): 33.60                 Control Elev(ft): 109.700


----------------------------------------------------------------------------------------------------
         Name: DS-3                From Node: DCS-3               Length(ft): 1190.00
        Group: UNIV                  To Node: DMH-33                   Count: 1

              UPSTREAM       DOWNSTREAM                  Friction Equation: Average Conveyance
     Geometry: Circular      Circular                   Solution Algorithm: Automatic
     Span(in): 60.00         60.00                                    Flow: Both
     Rise(in): 60.00         60.00                      Entrance Loss Coef: 3.000
   Invert(ft): 85.350        85.630                         Exit Loss Coef: 0.000
  Manning's N: 0.011000      0.011000                     Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                         Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                          Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

CONTROL STRUCTURE DCS-3

*** Weir 1 of 1 for Drop Structure DS-3 ***
                                                                                   TABLE
```

```
                  Count: 1                      Bottom Clip(in): 0.000
                   Type: Vertical: Mavis           Top Clip(in): 0.000
                   Flow: Both                    Weir Disc Coef: 3.100
               Geometry: Rectangular           Orifice Disc Coef: 0.600

               Span(in): 144.00                     Invert(ft): 98.170
               Rise(in): 54.00                Control Elev(ft): 98.170


----------------------------------------------------------------------------------------------------
         Name: DS-3A              From Node: DCS-3A             Length(ft): 280.00
        Group: UNIV                 To Node: DMH-33                  Count: 1

               UPSTREAM       DOWNSTREAM                 Friction Equation: Average Conveyance
     Geometry: Circular       Circular                  Solution Algorithm: Automatic
     Span(in): 24.00          24.00                                   Flow: Both
     Rise(in): 24.00          24.00                     Entrance Loss Coef: 0.500
   Invert(ft): 94.850         94.850                        Exit Loss Coef: 0.000
  Manning's N: 0.013000       0.013000                    Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                        Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                          Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

DROP STRUCTURE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
CONTROL STRUCTURE DCS-3A / POND 'D' DRAWDOWN WEIR

*** Weir 1 of 1 for Drop Structure DS-3A ***
                                                                                     TABLE
                  Count: 1                      Bottom Clip(in): 0.000
                   Type: Vertical: Mavis           Top Clip(in): 0.000
                   Flow: Both                    Weir Disc Coef: 3.100
               Geometry: Rectangular           Orifice Disc Coef: 0.600

               Span(in): 42.00                      Invert(ft): 96.000
               Rise(in): 9.00                 Control Elev(ft): 96.000


----------------------------------------------------------------------------------------------------
         Name: DS-A               From Node: DCS-1              Length(ft): 320.00
        Group: UNIV                 To Node: POND-C                  Count: 1

               UPSTREAM       DOWNSTREAM                 Friction Equation: Average Conveyance
     Geometry: Circular       Circular                  Solution Algorithm: Automatic
     Span(in): 48.00          48.00                                   Flow: Both
     Rise(in): 48.00          48.00                     Entrance Loss Coef: 0.500
   Invert(ft): 88.000         82.860                        Exit Loss Coef: 1.000
  Manning's N: 0.012000       0.012000                    Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                        Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                          Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

DROP STRUCTURE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99

CONTROL STRUCTURE DCS-1 OUTFALL TO POND 'C'

*** Weir 1 of 2 for Drop Structure DS-A ***
                                                                                     TABLE
                  Count: 1                      Bottom Clip(in): 0.000
                   Type: Vertical: Mavis           Top Clip(in): 0.000
                   Flow: Both                    Weir Disc Coef: 3.100
               Geometry: Rectangular           Orifice Disc Coef: 0.600

               Span(in): 60.00                      Invert(ft): 97.710
```

```
              Rise(in): 48.00                 Control Elev(ft): 97.710

*** Weir 2 of 2 for Drop Structure DS-A ***
                                                                                  TABLE
                 Count: 1                      Bottom Clip(in): 0.000
                  Type: Vertical: Mavis           Top Clip(in): 0.000
                  Flow: Both                    Weir Disc Coef: 3.100
              Geometry: Circular              Orifice Disc Coef: 0.600

              Span(in): 6.50                       Invert(ft): 96.000
              Rise(in): 6.50                  Control Elev(ft): 96.000


----------------------------------------------------------------------------------------------------
         Name: DS-B1               From Node: POND-B             Length(ft): 1460.00
        Group: UNIV                  To Node: POND-C                  Count: 1

              UPSTREAM       DOWNSTREAM                 Friction Equation: Average Conveyance
     Geometry: Circular      Circular                  Solution Algorithm: Automatic
     Span(in): 42.00         42.00                                   Flow: Both
     Rise(in): 42.00         42.00                     Entrance Loss Coef: 0.500
   Invert(ft): 95.460        87.240                        Exit Loss Coef: 1.000
  Manning's N: 0.012000      0.012000                    Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                        Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                          Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

DROP STRUCTURE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
SHOW LAGOON OUTFALL TO POND 'C'

*** Weir 1 of 1 for Drop Structure DS-B1 ***
                                                                                  TABLE
                 Count: 1                      Bottom Clip(in): 0.000
                  Type: Vertical: Mavis           Top Clip(in): 0.000
                  Flow: Both                    Weir Disc Coef: 3.200
              Geometry: Rectangular           Orifice Disc Coef: 0.600

              Span(in): 71.00                      Invert(ft): 99.940
              Rise(in): 9999.00               Control Elev(ft): 99.940


----------------------------------------------------------------------------------------------------
         Name: DS-B2               From Node: POND-B             Length(ft): 1085.00
        Group: UNIV                  To Node: NODE-D6                 Count: 1

              UPSTREAM       DOWNSTREAM                 Friction Equation: Average Conveyance
     Geometry: Circular      Circular                  Solution Algorithm: Automatic
     Span(in): 42.00         42.00                                   Flow: Both
     Rise(in): 42.00         42.00                     Entrance Loss Coef: 0.500
   Invert(ft): 95.570        89.760                        Exit Loss Coef: 0.000
  Manning's N: 0.012000      0.012000                    Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                        Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                          Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

DROP STRUCTURE DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
SHOW LAGOON OUTFALL TO BASIN D-4
**************NOTE*****************
ENTRANCE LOSS IN PIPE MODIFIED BY INWOOD.

*** Weir 1 of 1 for Drop Structure DS-B2 ***
                                                                                  TABLE
```

```
                 Count: 1                     Bottom Clip(in): 0.000
                  Type: Vertical: Mavis          Top Clip(in): 0.000
                  Flow: Both                   Weir Disc Coef: 3.200
              Geometry: Rectangular          Orifice Disc Coef: 0.600

              Span(in): 72.00                      Invert(ft): 100.500
              Rise(in): 48.00                Control Elev(ft): 100.500


----------------------------------------------------------------------------------------------------
         Name: DS-E2              From Node: WEIR-E2           Length(ft): 222.00
        Group: UNIV                 To Node: POND-I                 Count: 1

              UPSTREAM       DOWNSTREAM                 Friction Equation: Average Conveyance
     Geometry: Circular      Circular                  Solution Algorithm: Automatic
     Span(in): 36.00         36.00                                   Flow: Both
     Rise(in): 36.00         36.00                     Entrance Loss Coef: 1.100
   Invert(ft): 105.330       96.000                        Exit Loss Coef: 1.000
  Manning's N: 0.013000      0.013000                   Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                       Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                         Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

CONTROL STRUCTURE FOR POND 'E2' OUTFALL

*** Weir 1 of 3 for Drop Structure DS-E2 ***
                                                                                  TABLE
                 Count: 1                     Bottom Clip(in): 0.000
                  Type: Vertical: Mavis          Top Clip(in): 0.000
                  Flow: Both                   Weir Disc Coef: 3.100
              Geometry: Circular             Orifice Disc Coef: 0.600

              Span(in): 4.00                       Invert(ft): 105.670
              Rise(in): 4.00                 Control Elev(ft): 105.670

*** Weir 2 of 3 for Drop Structure DS-E2 ***
                                                                                  TABLE
                 Count: 1                     Bottom Clip(in): 0.000
                  Type: Vertical: Mavis          Top Clip(in): 0.000
                  Flow: Both                   Weir Disc Coef: 3.100
              Geometry: Rectangular          Orifice Disc Coef: 0.600

              Span(in): 72.00                      Invert(ft): 107.100
              Rise(in): 34.80                Control Elev(ft): 107.100

*** Weir 3 of 3 for Drop Structure DS-E2 ***
                                                                                  TABLE
                 Count: 1                     Bottom Clip(in): 0.000
                  Type: Vertical: Mavis          Top Clip(in): 0.000
                  Flow: Both                   Weir Disc Coef: 3.100
              Geometry: Rectangular          Orifice Disc Coef: 0.600

              Span(in): 72.00                      Invert(ft): 110.000
              Rise(in): 9999.00              Control Elev(ft): 110.000


----------------------------------------------------------------------------------------------------
         Name: DS-F               From Node: POND-F            Length(ft): 475.00
        Group: UNIV                 To Node: NODE-F                 Count: 1

              UPSTREAM       DOWNSTREAM                 Friction Equation: Average Conveyance
     Geometry: Circular      Circular                  Solution Algorithm: Automatic
     Span(in): 48.00         48.00                                   Flow: Both
     Rise(in): 48.00         48.00                     Entrance Loss Coef: 1.300
   Invert(ft): 92.000        92.000                        Exit Loss Coef: 0.000
  Manning's N: 0.012000      0.012000                   Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                       Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                         Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall
```

```
Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

POND 'F' OUTFALL (STRUCTURE G-2.0)

*** Weir 1 of 3 for Drop Structure DS-F ***
                                                                                    TABLE
                  Count: 6                    Bottom Clip(in): 0.000
                   Type: Vertical: Mavis         Top Clip(in): 0.000
                   Flow: Both                  Weir Disc Coef: 3.100
               Geometry: Circular            Orifice Disc Coef: 0.600

               Span(in): 6.00                      Invert(ft): 100.000
               Rise(in): 6.00                Control Elev(ft): 100.000

*** Weir 2 of 3 for Drop Structure DS-F ***
                                                                                    TABLE
                  Count: 1                    Bottom Clip(in): 0.000
                   Type: Vertical: Mavis         Top Clip(in): 0.000
                   Flow: Both                  Weir Disc Coef: 3.100
               Geometry: Rectangular         Orifice Disc Coef: 0.600

               Span(in): 36.00                     Invert(ft): 100.500
               Rise(in): 24.00               Control Elev(ft): 100.500

*** Weir 3 of 3 for Drop Structure DS-F ***
                                                                                    TABLE
                  Count: 1                    Bottom Clip(in): 0.000
                   Type: Vertical: Mavis         Top Clip(in): 0.000
                   Flow: Both                  Weir Disc Coef: 3.200
               Geometry: Rectangular         Orifice Disc Coef: 0.600

               Span(in): 66.00                     Invert(ft): 107.500
               Rise(in): 12.00               Control Elev(ft): 107.500


----------------------------------------------------------------------------------------------------
         Name: DS-F1               From Node: POND-F1            Length(ft): 160.00
        Group: UNIV                  To Node: POND-F                  Count: 1

               UPSTREAM       DOWNSTREAM              Friction Equation: Average Conveyance
     Geometry: Circular       Circular               Solution Algorithm: Automatic
     Span(in): 36.00          36.00                                Flow: Both
     Rise(in): 36.00          36.00                  Entrance Loss Coef: 0.500
   Invert(ft): 96.000         95.000                     Exit Loss Coef: 1.000
  Manning's N: 0.012000       0.012000                Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                    Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                      Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

PROPOSED POND 'F1' OUTFALL (STRUCTURE H-2.0) - MODIFIED

*** Weir 1 of 2 for Drop Structure DS-F1 ***
                                                                                    TABLE
                  Count: 4                    Bottom Clip(in): 0.000
                   Type: Vertical: Mavis         Top Clip(in): 0.000
                   Flow: Both                  Weir Disc Coef: 3.100
               Geometry: Circular            Orifice Disc Coef: 0.600

               Span(in): 4.00                      Invert(ft): 104.000
               Rise(in): 4.00                Control Elev(ft): 104.000

*** Weir 2 of 2 for Drop Structure DS-F1 ***
                                                                                    TABLE
                  Count: 1                    Bottom Clip(in): 0.000
                   Type: Vertical: Mavis         Top Clip(in): 0.000
                   Flow: Both                  Weir Disc Coef: 3.100
               Geometry: Rectangular         Orifice Disc Coef: 0.600

               Span(in): 42.00                     Invert(ft): 106.400
```

```
              Rise(in): 6.00                  Control Elev(ft): 106.400


----------------------------------------------------------------------------------------------------
         Name: DS-F2              From Node: POND-F2           Length(ft): 64.00
        Group: UNIV                 To Node: NODE-F                 Count: 1

              UPSTREAM       DOWNSTREAM                  Friction Equation: Average Conveyance
     Geometry: Circular      Circular                   Solution Algorithm: Automatic
     Span(in): 36.00         36.00                                    Flow: Both
     Rise(in): 36.00         36.00                      Entrance Loss Coef: 0.500
   Invert(ft): 97.000        97.000                         Exit Loss Coef: 0.000
  Manning's N: 0.013000      0.013000                     Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                         Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                           Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

POND "F2" OUTFALL (STRUCTURE G-3.0)

*** Weir 1 of 2 for Drop Structure DS-F2 ***
                                                                                     TABLE
                 Count: 1                      Bottom Clip(in): 0.000
                  Type: Vertical: Mavis           Top Clip(in): 0.000
                  Flow: Both                    Weir Disc Coef: 3.100
              Geometry: Circular              Orifice Disc Coef: 0.600

              Span(in): 3.00                        Invert(ft): 102.000
              Rise(in): 3.00                  Control Elev(ft): 102.000

*** Weir 2 of 2 for Drop Structure DS-F2 ***
                                                                                     TABLE
                 Count: 1                      Bottom Clip(in): 0.000
                  Type: Vertical: Mavis           Top Clip(in): 0.000
                  Flow: Both                    Weir Disc Coef: 3.100
              Geometry: Rectangular           Orifice Disc Coef: 0.600

              Span(in): 12.00                       Invert(ft): 103.600
              Rise(in): 6.00                  Control Elev(ft): 103.600


----------------------------------------------------------------------------------------------------
         Name: DS-H               From Node: POND-H            Length(ft): 52.00
        Group: UNIV                 To Node: NODE-H1                Count: 1

              UPSTREAM       DOWNSTREAM                  Friction Equation: Average Conveyance
     Geometry: Circular      Circular                   Solution Algorithm: Automatic
     Span(in): 24.00         24.00                                    Flow: Both
     Rise(in): 24.00         24.00                      Entrance Loss Coef: 0.500
   Invert(ft): 97.300        97.200                         Exit Loss Coef: 0.000
  Manning's N: 0.013000      0.013000                     Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000         0.000                         Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000         0.000                           Solution Incs: 10

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

WATERWAY POND "H" OUTFALL

*** Weir 1 of 1 for Drop Structure DS-H ***
                                                                                     TABLE
                 Count: 1                      Bottom Clip(in): 0.000
                  Type: Vertical: Mavis           Top Clip(in): 0.000
                  Flow: Both                    Weir Disc Coef: 3.100
              Geometry: Rectangular           Orifice Disc Coef: 0.600

              Span(in): 100.00                      Invert(ft): 102.000
              Rise(in): 60.00                 Control Elev(ft): 102.000
```

```
----------------------------------------------------------------------------------------------------
         Name: DS-H1               From Node: POND-H1           Length(ft): 15.00
        Group: UNIV                  To Node: NODE-H1                Count: 1

               UPSTREAM       DOWNSTREAM                 Friction Equation: Average Conveyance
     Geometry: Circular       Circular                  Solution Algorithm: Automatic
     Span(in): 24.00          24.00                                   Flow: Both
     Rise(in): 24.00          24.00                     Entrance Loss Coef: 0.500
   Invert(ft): 97.240         97.300                        Exit Loss Coef: 0.000
  Manning's N: 0.013000       0.013000                    Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                        Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                          Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

POND "H1" OUTFALL

*** Weir 1 of 3 for Drop Structure DS-H1 ***
                                                                                   TABLE
                  Count: 1                    Bottom Clip(in): 0.000
                   Type: Vertical: Mavis         Top Clip(in): 0.000
                   Flow: Both                  Weir Disc Coef: 3.200
               Geometry: Circular           Orifice Disc Coef: 0.600

               Span(in): 3.00                     Invert(ft): 101.000
               Rise(in): 3.00               Control Elev(ft): 101.000

*** Weir 2 of 3 for Drop Structure DS-H1 ***
                                                                                   TABLE
                  Count: 1                    Bottom Clip(in): 0.000
                   Type: Vertical: Mavis         Top Clip(in): 0.000
                   Flow: Both                  Weir Disc Coef: 3.100
               Geometry: Rectangular        Orifice Disc Coef: 0.600

               Span(in): 30.00                    Invert(ft): 102.400
               Rise(in): 43.20              Control Elev(ft): 102.400

*** Weir 3 of 3 for Drop Structure DS-H1 ***
                                                                                   TABLE
                  Count: 1                    Bottom Clip(in): 0.000
                   Type: Vertical: Mavis         Top Clip(in): 0.000
                   Flow: Both                  Weir Disc Coef: 3.100
               Geometry: Rectangular        Orifice Disc Coef: 0.600

               Span(in): 112.00                   Invert(ft): 106.000
               Rise(in): 12.00              Control Elev(ft): 106.000


----------------------------------------------------------------------------------------------------
         Name: DS-I                From Node: WEIR-I            Length(ft): 595.00
        Group: UNIV                  To Node: POND-H                 Count: 1

               UPSTREAM       DOWNSTREAM                 Friction Equation: Average Conveyance
     Geometry: Circular       Circular                  Solution Algorithm: Automatic
     Span(in): 48.00          48.00                                   Flow: Both
     Rise(in): 48.00          48.00                     Entrance Loss Coef: 2.800
   Invert(ft): 102.780        92.000                        Exit Loss Coef: 1.000
  Manning's N: 0.012000       0.012000                    Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                        Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                          Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

CONTROL STRUCTURE FOR POND 'I' OUTFALL

*** Weir 1 of 1 for Drop Structure DS-I ***
                                                                                   TABLE
```

```
                 Count: 1                      Bottom Clip(in): 0.000
                  Type: Vertical: Mavis           Top Clip(in): 0.000
                  Flow: Both                    Weir Disc Coef: 3.100
              Geometry: Rectangular           Orifice Disc Coef: 0.600

              Span(in): 72.00                      Invert(ft): 104.080
              Rise(in): 107.00                 Control Elev(ft): 104.080
```

```
         Name: F_OVERFLOW         From Node: POND-F           Length(ft): 1200.00
        Group: UNIV                 To Node: POND-H                Count: 1

               UPSTREAM       DOWNSTREAM                 Friction Equation: Automatic
     Geometry: Circular       Circular                  Solution Algorithm: Most Restrictive
     Span(in): 48.00          48.00                                   Flow: Both
     Rise(in): 48.00          48.00                     Entrance Loss Coef: 0.000
   Invert(ft): 95.000         94.000                        Exit Loss Coef: 1.000
  Manning's N: 0.012000       0.012000                   Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                       Inlet Ctrl Spec: Use dc
 Bot Clip(in): 0.000          0.000                         Solution Incs: 10
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

```
*** Weir 1 of 2 for Drop Structure F_OVERFLOW ***
                                                                                   TABLE
                 Count: 1                      Bottom Clip(in): 0.000
                  Type: Vertical: Mavis           Top Clip(in): 0.000
                  Flow: Both                    Weir Disc Coef: 3.200
              Geometry: Rectangular           Orifice Disc Coef: 0.600

              Span(in): 24.00                      Invert(ft): 103.000
              Rise(in): 6.00                   Control Elev(ft): 103.000

*** Weir 2 of 2 for Drop Structure F_OVERFLOW ***
                                                                                   TABLE
                 Count: 1                      Bottom Clip(in): 0.000
                  Type: Vertical: Mavis           Top Clip(in): 0.000
                  Flow: Both                    Weir Disc Coef: 3.200
              Geometry: Rectangular           Orifice Disc Coef: 0.600

              Span(in): 48.00                      Invert(ft): 106.750
              Rise(in): 3.00                   Control Elev(ft): 106.750
```

```
         Name: HILTON_NR2         From Node: HILTON_N10       Length(ft): 37.00
        Group: UNIV                 To Node: HILTON_N30            Count: 1

               UPSTREAM       DOWNSTREAM                 Friction Equation: Average Conveyance
     Geometry: Circular       Circular                  Solution Algorithm: Automatic
     Span(in): 30.00          30.00                                   Flow: Both
     Rise(in): 30.00          30.00                     Entrance Loss Coef: 0.500
   Invert(ft): 97.500         97.500                        Exit Loss Coef: 1.000
  Manning's N: 0.012000       0.012000                   Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                       Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                         Solution Incs: 0
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

DROP STRUCTURE DATA REFERENCED FROM AMERICAN WAY HILTON PERMIT
************ORIGINAL PERMIT COMMENT ******************
NORTH BASIN OFFLINE C.S. TO ATTENUATION POND

```
*** Weir 1 of 1 for Drop Structure HILTON_NR2 ***
                                                                                   TABLE
```

```
                Count: 1                       Bottom Clip(in): 0.000
                 Type: Vertical: Mavis            Top Clip(in): 0.000
                 Flow: Both                     Weir Disc Coef: 3.130
             Geometry: Rectangular            Orifice Disc Coef: 0.600

             Span(in): 104.00                       Invert(ft): 101.250
             Rise(in): 999.00                 Control Elev(ft): 98.500
```

```
----------------------------------------------------------------------------------------------------
         Name: HILTON_NR3         From Node: HILTON_N30        Length(ft): 80.00
        Group: UNIV                 To Node: DS18A                  Count: 1

               UPSTREAM       DOWNSTREAM                  Friction Equation: Average Conveyance
     Geometry: Circular       Circular                   Solution Algorithm: Automatic
     Span(in): 24.00          24.00                                    Flow: Both
     Rise(in): 24.00          24.00                      Entrance Loss Coef: 0.500
   Invert(ft): 97.000         97.000                         Exit Loss Coef: 1.000
  Manning's N: 0.012000       0.012000                     Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                         Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                           Solution Incs: 0
```

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

DROP STRUCTURE DATA REFERENCED FROM AMERICAN WAY HILTON PERMIT
************ORIGINAL PERMIT COMMENT ******************
NORTH BASIN ATTENUATION POND CONTROL STRUCTURE

```
*** Weir 1 of 3 for Drop Structure HILTON_NR3 ***
                                                                                   TABLE
                Count: 1                       Bottom Clip(in): 0.000
                 Type: Vertical: Mavis            Top Clip(in): 0.000
                 Flow: Both                     Weir Disc Coef: 3.130
             Geometry: Circular               Orifice Disc Coef: 0.600

             Span(in): 8.25                         Invert(ft): 97.500
             Rise(in): 8.25                   Control Elev(ft): 97.500

*** Weir 2 of 3 for Drop Structure HILTON_NR3 ***
                                                                                   TABLE
                Count: 1                       Bottom Clip(in): 0.000
                 Type: Vertical: Mavis            Top Clip(in): 0.000
                 Flow: Both                     Weir Disc Coef: 3.130
             Geometry: Rectangular            Orifice Disc Coef: 0.600

             Span(in): 8.00                         Invert(ft): 100.550
             Rise(in): 2.00                   Control Elev(ft): 97.500

*** Weir 3 of 3 for Drop Structure HILTON_NR3 ***
                                                                                   TABLE
                Count: 1                       Bottom Clip(in): 0.000
                 Type: Vertical: Mavis            Top Clip(in): 0.000
                 Flow: Both                     Weir Disc Coef: 3.130
             Geometry: Rectangular            Orifice Disc Coef: 0.600

             Span(in): 96.00                        Invert(ft): 101.480
             Rise(in): 999.00                 Control Elev(ft): 97.500
```

```
----------------------------------------------------------------------------------------------------
         Name: HILTON_SR2         From Node: HILTON_SN10       Length(ft): 30.00
        Group: UNIV                 To Node: HILTON_SN30            Count: 1

               UPSTREAM       DOWNSTREAM                  Friction Equation: Average Conveyance
     Geometry: Circular       Circular                   Solution Algorithm: Automatic
     Span(in): 24.00          24.00                                    Flow: Both
     Rise(in): 24.00          24.00                      Entrance Loss Coef: 0.500
   Invert(ft): 103.500        103.500                        Exit Loss Coef: 1.000
  Manning's N: 0.012000       0.012000                     Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                         Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                           Solution Incs: 0
```

```
Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

DROP STRUCTURE DATA REFERENCED FROM AMERICAN WAY HILTON PERMIT
************ORIGINAL PERMIT COMMENT ******************
SOUTH BASIN OFFLINE C.S. TO ATTENUATION POND

*** Weir 1 of 1 for Drop Structure HILTON_SR2 ***
                                                                                         TABLE
                  Count: 1                        Bottom Clip(in): 0.000
                   Type: Vertical: Mavis             Top Clip(in): 0.000
                   Flow: Both                      Weir Disc Coef: 3.130
               Geometry: Rectangular             Orifice Disc Coef: 0.600

               Span(in): 49.00                         Invert(ft): 105.250
               Rise(in): 999.00                  Control Elev(ft): 103.500


----------------------------------------------------------------------------------------------------
         Name: MOTEL6_CS2          From Node: MOTEL6_POND2       Length(ft): 40.00
        Group: UNIV                  To Node: DS18                    Count: 1

               UPSTREAM       DOWNSTREAM                 Friction Equation: Average Conveyance
     Geometry: Circular       Circular                  Solution Algorithm: Automatic
     Span(in): 24.00          24.00                                   Flow: Both
     Rise(in): 24.00          24.00                     Entrance Loss Coef: 0.500
   Invert(ft): 98.200         95.650                        Exit Loss Coef: 0.000
  Manning's N: 0.010000       0.010000                   Outlet Ctrl Spec: Use dc or tw
 Top Clip(in): 0.000          0.000                       Inlet Ctrl Spec: Use dn
 Bot Clip(in): 0.000          0.000                         Solution Incs: 0

Upstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

Downstream FHWA Inlet Edge Description:
Circular Concrete: Square edge w/ headwall

DROP STRUCTURE DATA REFERENCED FROM MOTEL 6 PERMIT
************ORIGINAL PERMIT COMMENT ******************
CONTROL STRUCTURE IN POND #2.

*** Weir 1 of 3 for Drop Structure MOTEL6_CS2 ***
                                                                                         TABLE
                  Count: 1                        Bottom Clip(in): 0.000
                   Type: Horizontal                  Top Clip(in): 0.000
                   Flow: Both                      Weir Disc Coef: 3.200
               Geometry: Rectangular             Orifice Disc Coef: 0.600

               Span(in): 24.00                         Invert(ft): 103.500
               Rise(in): 36.00                   Control Elev(ft): 103.500

*** Weir 2 of 3 for Drop Structure MOTEL6_CS2 ***
                                                                                         TABLE
                  Count: 1                        Bottom Clip(in): 0.000
                   Type: Vertical: Mavis             Top Clip(in): 0.000
                   Flow: Both                      Weir Disc Coef: 3.200
               Geometry: Circular                Orifice Disc Coef: 0.600

               Span(in): 3.00                          Invert(ft): 99.000
               Rise(in): 3.00                    Control Elev(ft): 99.000

*** Weir 3 of 3 for Drop Structure MOTEL6_CS2 ***
                                                                                         TABLE
                  Count: 1                        Bottom Clip(in): 0.000
                   Type: Vertical: Mavis             Top Clip(in): 0.000
                   Flow: Both                      Weir Disc Coef: 3.200
               Geometry: Rectangular             Orifice Disc Coef: 0.600

               Span(in): 8.00                          Invert(ft): 101.650
               Rise(in): 8.00                    Control Elev(ft): 101.650


==========================================================================================
```

```
==== Weirs =========================================================================
====================================================================================

         Name: I-OVER              From Node: POND-I
        Group: UNIV                  To Node: WEIR-I
         Flow: Both                    Count: 1
         Type: Vertical: Fread      Geometry: Rectangular

                    Span(in): 1335.00
                    Rise(in): 999.00
                  Invert(ft): 106.000
       Control Elevation(ft): 106.000
                                            TABLE
             Bottom Clip(in): 0.000
                Top Clip(in): 0.000
         Weir Discharge Coef: 3.100
      Orifice Discharge Coef: 0.600



----------------------------------------------------------------------------------------------------
         Name: MOTEL6_WEIR         From Node: MOTEL6_POND1
        Group: UNIV                  To Node: MOTEL6_POND2
         Flow: Both                    Count: 1
         Type: Vertical: Mavis      Geometry: Rectangular

                    Span(in): 240.00
                    Rise(in): 999.00
                  Invert(ft): 103.000
       Control Elevation(ft): 103.000
                                            TABLE
             Bottom Clip(in): 0.000
                Top Clip(in): 0.000
         Weir Discharge Coef: 3.200
      Orifice Discharge Coef: 0.600

WEIR DATA REFERENCED FROM MOTEL 6 PERMIT


----------------------------------------------------------------------------------------------------
         Name: RW-DCS7             From Node: DCS-7
        Group: UNIV                  To Node: US30-32
         Flow: Both                    Count: 1
         Type: Vertical: Mavis      Geometry: Rectangular

                    Span(in): 164.00
                    Rise(in): 999.00
                  Invert(ft): 94.000
       Control Elevation(ft): 94.000
                                            TABLE
             Bottom Clip(in): 0.000
                Top Clip(in): 0.000
         Weir Discharge Coef: 3.100
      Orifice Discharge Coef: 0.600

WEIR DATA REFERENCED FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
DRAINAGE CONTROL STRUCTURE DCS-7

----------------------------------------------------------------------------------------------------
         Name: RW-DOT3             From Node: DOT-3
        Group: UNIV                  To Node: US30-32
         Flow: Both                    Count: 1
         Type: Vertical: Mavis      Geometry: Rectangular

                    Span(in): 240.00
                    Rise(in): 9999.00
                  Invert(ft): 100.500
       Control Elevation(ft): 100.500
                                            TABLE
             Bottom Clip(in): 0.000
                Top Clip(in): 0.000
         Weir Discharge Coef: 2.600
      Orifice Discharge Coef: 0.600
```

```
WEIR DATA REFERENCE FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
HIGH POINT (KIRKMAN ROAD. SHOULDER @ 101.00)

----------------------------------------------------------------------------------------------------
         Name: RW-OVER             From Node: POND-H
        Group: UNIV                  To Node: OVERFLOW
         Flow: Both                    Count: 1
         Type: Horizontal           Geometry: Rectangular

                    Span(in): 49.00
                    Rise(in): 37.00
                  Invert(ft): 103.130
       Control Elevation(ft): 103.130
                                              TABLE
             Bottom Clip(in): 0.000
                Top Clip(in): 0.000
         Weir Discharge Coef: 3.100
      Orifice Discharge Coef: 0.600

WEIR DATA REFERENCE FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
POND 'H' EMERGENCY OVERFLOW WEIR (STRUCTURE TOP)

----------------------------------------------------------------------------------------------------
         Name: TW-E1               From Node: POND-E1
        Group: UNIV                  To Node: POND-E2
         Flow: Both                    Count: 1
         Type: Vertical: Mavis      Geometry: Trapezoidal

            Bottom Width(ft): 6.00
        Left Side Slope(h/v): 2.00
       Right Side Slope(h/v): 2.00
                  Invert(ft): 114.000
       Control Elevation(ft): 114.000
      Struct Opening Dim(ft): 999.00
                                              TABLE
             Bottom Clip(ft): 0.000
                Top Clip(ft): 0.000
         Weir Discharge Coef: 2.600
      Orifice Discharge Coef: 0.600

WEIR DATA REFERENCE FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
FABRI-FORM WEIR BETWEEN POND E1 AND POND E2

----------------------------------------------------------------------------------------------------
         Name: TW-F1               From Node: POND-F1
        Group: UNIV                  To Node: POND-F
         Flow: Both                    Count: 1
         Type: Vertical: Mavis      Geometry: Trapezoidal

            Bottom Width(ft): 30.00
        Left Side Slope(h/v): 10.00
       Right Side Slope(h/v): 10.00
                  Invert(ft): 112.000
       Control Elevation(ft): 112.000
      Struct Opening Dim(ft): 999.00
                                              TABLE
             Bottom Clip(ft): 0.000
                Top Clip(ft): 0.000
         Weir Discharge Coef: 3.000
      Orifice Discharge Coef: 0.600

DESCRIPTION: OVERLAND WEIR
LOCATION: OVERTOPPING STORMWATER POND TOB
DATA SOURCES: 2002 SHINGLE CREEK 1' AERIAL CONTOURS, USGS 2002 COLOR AERIAL

----------------------------------------------------------------------------------------------------
         Name: TW-OVER             From Node: POND-H
        Group: UNIV                  To Node: OVERFLOW
         Flow: Both                    Count: 1
         Type: Vertical: Mavis      Geometry: Trapezoidal
```

```
            Bottom Width(ft): 0.00
        Left Side Slope(h/v): 2.00
       Right Side Slope(h/v): 2.00
                  Invert(ft): 102.000
       Control Elevation(ft): 102.000
      Struct Opening Dim(ft): 1.00
                                              TABLE
             Bottom Clip(ft): 0.000
                Top Clip(ft): 0.000
          Weir Discharge Coef: 3.100
      Orifice Discharge Coef: 0.600
```

WEIR DATA REFERENCE FROM UNIVERSAL CITY MASTER
STORMWATER SYSTEM MODEL 08/26/99
************ORIGINAL PERMIT COMMENT ******************
POND 'H' EMERGENCY OVERFLOW WEIR (V-NOTCH)

```
----------------------------------------------------------------------------------------------------
         Name: W_D2                From Node: POND-D2
        Group: UNIV                  To Node: POND-D
         Flow: Both                    Count: 1
         Type: Vertical: Fread      Geometry: Rectangular

                    Span(in): 1176.00
                    Rise(in): 999.00
                  Invert(ft): 105.000
       Control Elevation(ft): 105.000
                                              TABLE
             Bottom Clip(in): 0.000
                Top Clip(in): 0.000
         Weir Discharge Coef: 3.200
      Orifice Discharge Coef: 0.600
```

Overland Flow

```
----------------------------------------------------------------------------------------------------
         Name: W_D_DS23            From Node: POND-D
        Group: UNIV                  To Node: DS23
         Flow: Both                    Count: 1
         Type: Vertical: Paved      Geometry: Rectangular

                    Span(in): 1200.00
                    Rise(in): 9999.00
                  Invert(ft): 105.000
       Control Elevation(ft): 105.000
                                              TABLE
             Bottom Clip(in): 0.000
                Top Clip(in): 0.000
         Weir Discharge Coef: 3.000
      Orifice Discharge Coef: 0.600
```

DESCRIPTION: OVERLAND WEIR
LOCATION: OVERTOPPING OVERTOPPING STORMWATER POND TOB TO SWALE ON THE NORTH
SIDE OF I-4
DATA SOURCES: 2002 SHINGLE CREEK 1' AERIAL CONTOURS, USGS 2002 COLOR AERIAL

```
----------------------------------------------------------------------------------------------------
         Name: W_DS15_300          From Node: DS15
        Group: UNIV                  To Node: 300
         Flow: Both                    Count: 1
         Type: Vertical: Fread      Geometry: Rectangular

                    Span(in): 360.00
                    Rise(in): 9999.00
                  Invert(ft): 105.000
       Control Elevation(ft): 105.000
                                              TABLE
             Bottom Clip(in): 0.000
                Top Clip(in): 0.000
         Weir Discharge Coef: 2.800
      Orifice Discharge Coef: 0.600
```

DESCRIPTION: OVERLAND WEIR
LOCATION: OVERTOPPING STRUCTURE ON THE SOUTH SIDE OF I-4 TO STORMWATER POND
DATA SOURCES: 2002 SHINGLE CREEK 1' AERIAL CONTOURS, USGS 2002 COLOR AERIAL

```
----------------------------------------------------------------------------------------------------
         Name: W_HN10_HN20         From Node: HILTON_N10
        Group: UNIV                  To Node: HILTON_N20
         Flow: Both                    Count: 1
         Type: Vertical: Fread      Geometry: Rectangular

                    Span(in): 48.00
                    Rise(in): 9999.00
                  Invert(ft): 103.000
       Control Elevation(ft): 103.000
                                                 TABLE
              Bottom Clip(in): 0.000
                 Top Clip(in): 0.000
          Weir Discharge Coef: 2.900
      Orifice Discharge Coef: 0.600

DESCRIPTION: OVERLAND WEIR
LOCATION: OVERTOPPING WEIR STRUCTURE TO AMERICAN WAY HILTON STORMWATER POND
DATA SOURCES: 2002 SHINGLE CREEK 1' AERIAL CONTOURS, USGS 2002 COLOR AERIAL

----------------------------------------------------------------------------------------------------
         Name: W_HN20_DS18A        From Node: HILTON_N20
        Group: UNIV                  To Node: DS18A
         Flow: Both                    Count: 1
         Type: Vertical: Fread      Geometry: Rectangular

                    Span(in): 840.00
                    Rise(in): 9999.00
                  Invert(ft): 103.000
       Control Elevation(ft): 103.000
                                                 TABLE
              Bottom Clip(in): 0.000
                 Top Clip(in): 0.000
          Weir Discharge Coef: 2.900
      Orifice Discharge Coef: 0.600

DESCRIPTION: OVERLAND WEIR
LOCATION: OVERTOPPING AMERICAN WAY HILTON STORMWATER POND TOB
DATA SOURCES: 2002 SHINGLE CREEK 1' AERIAL CONTOURS, USGS 2002 COLOR AERIAL

----------------------------------------------------------------------------------------------------
         Name: W_HN30_DS18A        From Node: HILTON_N30
        Group: UNIV                  To Node: DS18A
         Flow: Both                    Count: 1
         Type: Vertical: Fread      Geometry: Rectangular

                    Span(in): 840.00
                    Rise(in): 9999.00
                  Invert(ft): 103.000
       Control Elevation(ft): 103.000
                                                 TABLE
              Bottom Clip(in): 0.000
                 Top Clip(in): 0.000
          Weir Discharge Coef: 2.900
      Orifice Discharge Coef: 0.600

DESCRIPTION: OVERLAND WEIR
LOCATION: OVERTOPPING AMERICAN WAY HILTON STORMWATER POND
DATA SOURCES: 2002 SHINGLE CREEK 1' AERIAL CONTOURS, USGS 2002 COLOR AERIAL

----------------------------------------------------------------------------------------------------
         Name: W_HOLI_DS30-32      From Node: HOLIDAY
        Group: UNIV                  To Node: DS30-32
         Flow: Both                    Count: 1
         Type: Vertical: Fread      Geometry: Rectangular

                    Span(in): 480.00
                    Rise(in): 9999.00
                  Invert(ft): 97.000
       Control Elevation(ft): 97.000
                                                 TABLE
              Bottom Clip(in): 0.000
                 Top Clip(in): 0.000
          Weir Discharge Coef: 2.800
      Orifice Discharge Coef: 0.600
```

```
----------------------------------------------------------------------------------------------------
         Name: W_HSN10_HSN30       From Node: HILTON_SN10
        Group: UNIV                  To Node: HILTON_SN30
         Flow: Both                    Count: 1
         Type: Vertical: Fread      Geometry: Rectangular

                    Span(in): 48.00
                    Rise(in): 9999.00
                  Invert(ft): 106.600
       Control Elevation(ft): 106.600
                                             TABLE
             Bottom Clip(in): 0.000
                Top Clip(in): 0.000
         Weir Discharge Coef: 2.900
      Orifice Discharge Coef: 0.600

DESCRIPTION: OVERLAND WEIR
LOCATION: OVERTOPPING WEIR STRUCTURE TO AMERICAN WAY HILTON STORMWATER POND
DATA SOURCES: 2002 SHINGLE CREEK 1' AERIAL CONTOURS, USGS 2002 COLOR AERIAL

----------------------------------------------------------------------------------------------------
         Name: W_M6P1_400          From Node: MOTEL6_POND1
        Group: UNIV                  To Node: 400
         Flow: Both                    Count: 1
         Type: Vertical: Fread      Geometry: Rectangular

                    Span(in): 840.00
                    Rise(in): 9999.00
                  Invert(ft): 104.000
       Control Elevation(ft): 104.000
                                             TABLE
             Bottom Clip(in): 0.000
                Top Clip(in): 0.000
         Weir Discharge Coef: 2.900
      Orifice Discharge Coef: 0.600

DESCRIPTION: OVERLAND WEIR
LOCATION: OVERTOPPING MOTEL 6 STORMWATER POND TOB
DATA SOURCES: 2002 SHINGLE CREEK 1' AERIAL CONTOURS, USGS 2002 COLOR AERIAL

----------------------------------------------------------------------------------------------------
         Name: W_NG1_PONDF1        From Node: NODE-G1
        Group: UNIV                  To Node: POND-F1
         Flow: Both                    Count: 1
         Type: Vertical: Paved      Geometry: Rectangular

                    Span(in): 120.00
                    Rise(in): 9999.00
                  Invert(ft): 117.000
       Control Elevation(ft): 117.000
                                             TABLE
             Bottom Clip(in): 0.000
                Top Clip(in): 0.000
         Weir Discharge Coef: 3.000
      Orifice Discharge Coef: 0.600



----------------------------------------------------------------------------------------------------
         Name: W_NODED4            From Node: NODE-D4
        Group: UNIV                  To Node: SPG
         Flow: Both                    Count: 1
         Type: Vertical: Fread      Geometry: Rectangular

                    Span(in): 60.00
                    Rise(in): 999.00
                  Invert(ft): 104.230
       Control Elevation(ft): 104.230
                                             TABLE
             Bottom Clip(in): 0.000
                Top Clip(in): 0.000
         Weir Discharge Coef: 3.200
      Orifice Discharge Coef: 0.600
```

Overland Flow

```
----------------------------------------------------------------------------------------------------
         Name: W_PONDA_PONDC       From Node: POND-A
        Group: UNIV                  To Node: POND-C
         Flow: Both                    Count: 1
         Type: Vertical: Paved      Geometry: Rectangular

                    Span(in): 1200.00
                    Rise(in): 9999.00
                  Invert(ft): 104.000
       Control Elevation(ft): 104.000
                                             TABLE
             Bottom Clip(in): 0.000
                Top Clip(in): 0.000
         Weir Discharge Coef: 3.000
      Orifice Discharge Coef: 0.600

DESCRIPTION: OVERLAND WEIR
LOCATION: OVERTOPPING UNIVERSAL BLVD
DATA SOURCES: 2002 SHINGLE CREEK 1' AERIAL CONTOURS, USGS 2002 COLOR AERIAL

----------------------------------------------------------------------------------------------------
         Name: W_US16_300          From Node: US16
        Group: UNIV                  To Node: 300
         Flow: Both                    Count: 1
         Type: Vertical: Fread      Geometry: Rectangular

                    Span(in): 840.00
                    Rise(in): 9999.00
                  Invert(ft): 101.000
       Control Elevation(ft): 101.000
                                             TABLE
             Bottom Clip(in): 0.000
                Top Clip(in): 0.000
         Weir Discharge Coef: 2.900
      Orifice Discharge Coef: 0.600

DESCRIPTION: OVERLAND WEIR
LOCATION: OVERTOPPING INLET STRUCTURE TO I-4 STORMWATER POND
DATA SOURCES: 2002 SHINGLE CREEK 1' AERIAL CONTOURS, USGS 2002 COLOR AERIAL

----------------------------------------------------------------------------------------------------
         Name: W_US3536_FLC05      From Node: US35-36
        Group: UNIV                  To Node: FLCENTER05
         Flow: Both                    Count: 1
         Type: Vertical: Fread      Geometry: Trapezoidal

            Bottom Width(ft): 5.00
        Left Side Slope(h/v): 4.00
       Right Side Slope(h/v): 4.00
                  Invert(ft): 91.690
       Control Elevation(ft): 91.690
      Struct Opening Dim(ft): 9999.00
                                             TABLE
             Bottom Clip(ft): 0.000
                Top Clip(ft): 0.000
         Weir Discharge Coef: 2.800
      Orifice Discharge Coef: 0.600

DESCRIPTION: WEIR FROM SWALE ON NORTH SIDE OF I-4 TO DITCH THAT CROSSES UNDER I-4
DATA SOURCE: UNIVERSAL CITY PERMIT, 1999.

==========================================================================================
==== Rating Curves =======================================================================
==========================================================================================

         Name: RC-DPHS             From Node: DPHS                      Count: 1
        Group: UNIV                  To Node: POND-E1                    Flow: Both

              TABLE           ELEV ON(ft)     ELEV OFF(ft)
           #1: OT-DPHS        0.000           0.000
           #2:                0.000           0.000
           #3:                0.000           0.000
           #4:                0.000           0.000
```

RATING CURVE DATA REFERENCED FROM UNIVERSAL CITY MASTER STORMWATER
SYSTEM 8/26/99
************ORIGINAL PERMIT COMMENTS**************
EXISTING INFLOW FROM DR. PHILLIPS HIGH SCHOOL

```
==========================================================================================
==== Hydrology Simulations ===============================================================
==========================================================================================

         Name: 10-24-FDOT
     Filename: G:\PROJ\06008049\CIVIL\CALCS\Storm Water\ICPR\Pacifica Overflow Copy\10-24-FDOT.R32

      Override Defaults: Yes
    Storm Duration(hrs): 24.00
          Rainfall File: Fdot-24
    Rainfall Amount(in): 7.60

Time(hrs)       Print Inc(min)
--------------- ---------------
6.000           30.00
8.000           15.00
12.000          10.00
16.000          15.00
30.000          30.00

----------------------------------------------------------------------------------------------------
         Name: 100-24-FDOT
     Filename: G:\PROJ\06008049\CIVIL\CALCS\Storm Water\ICPR\Pacifica Overflow Copy\100-24-FDOT.R32

      Override Defaults: Yes
    Storm Duration(hrs): 24.00
          Rainfall File: Fdot-24
    Rainfall Amount(in): 10.60

Time(hrs)       Print Inc(min)
--------------- ---------------
6.000           30.00
8.000           15.00
12.000          10.00
16.000          15.00
30.000          30.00

----------------------------------------------------------------------------------------------------
         Name: 100-24-SF
     Filename: G:\PROJ\06008049\CIVIL\CALCS\Storm Water\ICPR\Pacifica Overflow Copy\100-24-SF.R32

      Override Defaults: Yes
    Storm Duration(hrs): 24.00
          Rainfall File: SFWMD24
    Rainfall Amount(in): 10.60

Time(hrs)       Print Inc(min)
--------------- ---------------
6.000           30.00
8.000           15.00
12.000          10.00
16.000          15.00
30.000          30.00

----------------------------------------------------------------------------------------------------
         Name: 100YR24HR
     Filename: G:\PROJ\06008049\CIVIL\CALCS\Storm Water\ICPR\Pacifica Overflow Copy\100YR24HR.R32

      Override Defaults: Yes
    Storm Duration(hrs): 24.00
          Rainfall File: Orange
    Rainfall Amount(in): 10.60

Time(hrs)       Print Inc(min)
--------------- ---------------
6.000           30.00
8.000           15.00
12.000          10.00
16.000          15.00
30.000          30.00
```

```
----------------------------------------------------------------------------------------------------
         Name: 100YR72HR
     Filename: G:\PROJ\06008049\CIVIL\CALCS\Storm Water\ICPR\Pacifica Overflow Copy\100YR72HR.R32

      Override Defaults: Yes
    Storm Duration(hrs): 72.00
          Rainfall File: Sfwmd72
    Rainfall Amount(in): 12.00

Time(hrs)       Print Inc(min)
--------------- ---------------
50.000          30.00
58.000          15.00
70.000          10.00
80.000          15.00
100.000         30.00

----------------------------------------------------------------------------------------------------
         Name: 25-24-FDOT
     Filename: G:\PROJ\06008049\CIVIL\CALCS\Storm Water\ICPR\Pacifica Overflow Copy\25-24-FDOT.R32

      Override Defaults: Yes
    Storm Duration(hrs): 24.00
          Rainfall File: Fdot-24
    Rainfall Amount(in): 8.60

Time(hrs)       Print Inc(min)
--------------- ---------------
6.000           30.00
8.000           15.00
12.000          10.00
16.000          15.00
30.000          30.00

----------------------------------------------------------------------------------------------------
         Name: 25-72-SF
     Filename: G:\PROJ\06008049\CIVIL\CALCS\Storm Water\ICPR\Pacifica Overflow Copy\25-72-SF.R32

      Override Defaults: Yes
    Storm Duration(hrs): 72.00
          Rainfall File: Sfwmd72
    Rainfall Amount(in): 9.50

Time(hrs)       Print Inc(min)
--------------- ---------------
50.000          30.00
58.000          15.00
70.000          10.00
80.000          15.00
100.000         30.00

==================================================================================================
==== Routing Simulations =========================================================================
==================================================================================================

         Name: 10-24-FDOT          Hydrology Sim: 10-24-FDOT
     Filename: G:\PROJ\06008049\CIVIL\CALCS\Storm Water\ICPR\Pacifica Overflow Copy\10-24-FDOT.I32

      Execute: Yes         Restart: No            Patch: No
  Alternative: No

        Max Delta Z(ft): 1.00                     Delta Z Factor: 0.00500
    Time Step Optimizer: 10.000
        Start Time(hrs): 0.000                     End Time(hrs): 48.00
     Min Calc Time(sec): 0.5000               Max Calc Time(sec): 60.0000
        Boundary Stages:                          Boundary Flows:


Time(hrs)       Print Inc(min)
--------------- ---------------
6.000           30.000
8.000           15.000
12.000          10.000
16.000          15.000
```

```
48.000          30.000

Group           Run
--------------- -----
BASE            Yes
FCN             Yes
FCS             Yes
MILL            Yes
OP_TABLES       Yes
SHINGLE         Yes
TRAD            Yes
UNIV            Yes


----------------------------------------------------------------------------------------------------
         Name: 100-24-FDOT         Hydrology Sim: 100-24-FDOT
     Filename: G:\PROJ\06008049\CIVIL\CALCS\Storm Water\ICPR\Pacifica Overflow Copy\100-24-FDOT.I32

      Execute: Yes         Restart: No            Patch: No
  Alternative: No

        Max Delta Z(ft): 1.00                     Delta Z Factor: 0.00500
    Time Step Optimizer: 10.000
        Start Time(hrs): 0.000                     End Time(hrs): 48.00
     Min Calc Time(sec): 0.5000               Max Calc Time(sec): 60.0000
        Boundary Stages:                          Boundary Flows:



Time(hrs)       Print Inc(min)
--------------- ---------------
6.000           30.000
8.000           15.000
12.000          10.000
16.000          15.000
48.000          30.000

Group           Run
--------------- -----
BASE            Yes
FCN             Yes
FCS             Yes
MILL            Yes
OP_TABLES       Yes
SHINGLE         Yes
TRAD            Yes
UNIV            Yes


----------------------------------------------------------------------------------------------------
         Name: 100-24-SF           Hydrology Sim: 100-24-SF
     Filename: G:\PROJ\06008049\CIVIL\CALCS\STORM WATER\ICPR\PACIFICA OVERFLOW COPY\100-24-SF.I32

      Execute: Yes         Restart: No            Patch: No
  Alternative: No

        Max Delta Z(ft): 1.00                     Delta Z Factor: 0.00500
    Time Step Optimizer: 10.000
        Start Time(hrs): 0.000                     End Time(hrs): 30.00
     Min Calc Time(sec): 0.5000               Max Calc Time(sec): 60.0000
        Boundary Stages:                          Boundary Flows:



Time(hrs)       Print Inc(min)
--------------- ---------------
6.000           30.000
8.000           15.000
12.000          10.000
16.000          15.000
30.000          30.000

Group           Run
--------------- -----
BASE            Yes
FCN             Yes
```

```
FCS             Yes
MILL            Yes
OP_TABLES       Yes
SHINGLE         Yes
TRAD            Yes
UNIV            Yes


----------------------------------------------------------------------------------------------------
         Name: 100yr24hr          Hydrology Sim: 100YR24HR
     Filename: G:\PROJ\06008049\CIVIL\CALCS\Storm Water\ICPR\Pacifica Overflow Copy\100yr24hr.I32

      Execute: Yes         Restart: No            Patch: No
  Alternative: No

        Max Delta Z(ft): 1.00                     Delta Z Factor: 0.00500
    Time Step Optimizer: 10.000
        Start Time(hrs): 0.000                     End Time(hrs): 96.00
     Min Calc Time(sec): 0.5000               Max Calc Time(sec): 60.0000
        Boundary Stages:                          Boundary Flows:



Time(hrs)       Print Inc(min)
--------------- ---------------
6.000           30.000
8.000           15.000
12.000          10.000
16.000          15.000
48.000          30.000

Group           Run
--------------- -----
BASE            Yes
FCN             Yes
FCS             Yes
MILL            Yes
OP_TABLES       Yes
SHINGLE         Yes
TRAD            Yes
UNIV            Yes


----------------------------------------------------------------------------------------------------
         Name: 100YR72HR          Hydrology Sim: 100YR72HR
     Filename: G:\PROJ\06008049\CIVIL\CALCS\Storm Water\ICPR\Pacifica Overflow Copy\100YR72HR.I32

      Execute: Yes         Restart: No            Patch: No
  Alternative: No

        Max Delta Z(ft): 1.00                     Delta Z Factor: 0.00500
    Time Step Optimizer: 10.000
        Start Time(hrs): 0.000                     End Time(hrs): 150.00
     Min Calc Time(sec): 0.5000               Max Calc Time(sec): 60.0000
        Boundary Stages:                          Boundary Flows:

FLORIDA CENTER FLOODPLAINS SOUTH - 100 YEAR 72 HOUR STORM EVENT ROUTING


Time(hrs)       Print Inc(min)
--------------- ---------------
50.000          30.000
58.000          15.000
70.000          10.000
80.000          15.000
150.000         30.000

Group           Run
--------------- -----
BASE            Yes
FCN             Yes
FCS             Yes
MILL            Yes
OP_TABLES       Yes
SHINGLE         Yes
TRAD            Yes
```

```
UNIV            Yes


----------------------------------------------------------------------------------------------------
         Name: 25-24-FDOT          Hydrology Sim: 25-24-FDOT
     Filename: G:\PROJ\06008049\CIVIL\CALCS\Storm Water\ICPR\Pacifica Overflow Copy\25-24-FDOT.I32

      Execute: Yes         Restart: No            Patch: No
  Alternative: No

        Max Delta Z(ft): 1.00                    Delta Z Factor: 0.00500
    Time Step Optimizer: 10.000
        Start Time(hrs): 0.000                    End Time(hrs): 48.00
     Min Calc Time(sec): 0.5000              Max Calc Time(sec): 60.0000
        Boundary Stages:                         Boundary Flows:



Time(hrs)       Print Inc(min)
--------------- ---------------
6.000           30.000
8.000           15.000
12.000          10.000
16.000          15.000
48.000          30.000

Group           Run
--------------- -----
BASE            Yes
FCN             Yes
FCS             Yes
MILL            Yes
OP_TABLES       Yes
SHINGLE         Yes
TRAD            Yes
UNIV            Yes


----------------------------------------------------------------------------------------------------
         Name: 25-72-SF            Hydrology Sim: 25-72-SF
     Filename: G:\PROJ\06008049\CIVIL\CALCS\Storm Water\ICPR\Pacifica Overflow Copy\25-72-SF.I32

      Execute: Yes         Restart: No            Patch: No
  Alternative: No

        Max Delta Z(ft): 1.00                    Delta Z Factor: 0.00500
    Time Step Optimizer: 10.000
        Start Time(hrs): 0.000                    End Time(hrs): 150.00
     Min Calc Time(sec): 0.5000              Max Calc Time(sec): 60.0000
        Boundary Stages:                         Boundary Flows:

FLORIDA CENTER FLOODPLAINS SOUTH - 25 YEAR 72 HOUR STORM EVENT ROUTING


Time(hrs)       Print Inc(min)
--------------- ---------------
50.000          30.000
58.000          15.000
70.000          10.000
80.000          15.000
150.000         30.000

Group           Run
--------------- -----
BASE            Yes
FCN             Yes
FCS             Yes
MILL            Yes
OP_TABLES       Yes
SHINGLE         Yes
TRAD            Yes
UNIV            Yes
```

Name	Group	Simulation	Max Time Stage hrs	Max Stage ft	Warning Stage ft	Max Delta Stage ft	Max Surf Area ft2	Max Time Inflow hrs	Max Inflow cfs	Max Time Outflow hrs	Max Outflow cfs
200	UNIV	10-24-FDOT	15.17	111.027	113.500	0.0001	43663	12.00	9.672	15.17	5.730
200-OUT	UNIV	10-24-FDOT	15.27	107.729	115.000	0.0000	8908	15.17	5.730	15.27	5.727
300	UNIV	10-24-FDOT	19.21	99.606	102.000	0.0001	27381	12.00	3.924	15.25	1.502
400	UNIV	10-24-FDOT	19.22	99.602	103.000	0.0001	33288	12.00	4.199	19.27	2.456
500	UNIV	10-24-FDOT	21.33	102.801	105.000	0.0001	81548	12.00	13.911	21.33	3.421
AW_HOTEL	UNIV	10-24-FDOT	12.00	103.172	104.000	0.0002	4321	12.00	1.709	12.00	1.709
D260	UNIV	10-24-FDOT	12.00	134.440	141.000	-0.0001	3595	12.00	6.442	11.99	6.442
DCS-1	UNIV	10-24-FDOT	21.28	101.953	104.000	0.0004	4362	12.25	27.154	12.29	26.428
DCS-2	UNIV	10-24-FDOT	21.02	100.617	111.500	0.0001	4535	19.00	41.862	19.02	41.750
DCS-3	UNIV	10-24-FDOT	21.06	102.262	107.890	0.0001	4439	21.00	80.834	21.03	80.744
DCS-3A	UNIV	10-24-FDOT	21.47	102.200	106.000	0.0001	4364	21.06	11.988	22.73	12.051
DCS-7	UNIV	10-24-FDOT	21.21	99.515	104.000	0.0001	21800	21.02	134.238	21.05	134.092
DMH-33	UNIV	10-24-FDOT	21.15	100.179	104.000	0.0001	4376	21.03	92.671	21.06	92.639
DOT-1	UNIV	10-24-FDOT	19.24	97.403	100.200	0.0001	4638	12.00	2.189	12.26	2.154
DOT-2	UNIV	10-24-FDOT	19.25	97.401	101.000	0.0001	5769	12.00	2.998	12.11	2.920
DOT-3	UNIV	10-24-FDOT	19.25	97.401	101.000	0.0001	5762	12.00	3.700	12.11	3.624
DPHS	UNIV	10-24-FDOT	0.00	120.000	120.000	0.0000	0	0.00	0.000	18.00	26.000
DS15	UNIV	10-24-FDOT	12.02	102.300	105.000	0.0000	4456	12.00	17.209	12.02	17.178
DS17	UNIV	10-24-FDOT	12.41	97.710	103.000	0.0002	7100	12.02	27.731	12.05	27.175
DS18	UNIV	10-24-FDOT	12.55	97.608	102.000	0.0002	6718	12.06	27.964	12.09	27.439
DS18A	UNIV	10-24-FDOT	12.68	97.486	102.000	0.0001	39169	12.10	30.527	13.22	29.422
DS20	UNIV	10-24-FDOT	12.72	97.001	105.000	0.0003	15600	12.53	61.052	12.60	60.831
DS21	UNIV	10-24-FDOT	12.86	96.701	105.000	0.0003	30650	12.38	68.448	12.62	67.638
DS22	UNIV	10-24-FDOT	21.13	99.339	105.000	0.0001	9883	10.85	1.776	0.00	0.000
DS23	UNIV	10-24-FDOT	21.24	99.257	105.000	0.0001	34592	15.00	9.233	16.59	8.547
DS26	UNIV	10-24-FDOT	21.45	98.714	105.000	-0.0001	33182	10.91	4.581	9.79	7.947
DS27	UNIV	10-24-FDOT	13.05	96.313	105.000	0.0003	51628	12.61	73.041	12.93	72.229
DS29	UNIV	10-24-FDOT	19.17	96.573	105.000	0.0002	35749	19.22	144.128	19.38	144.214
DS30-32	UNIV	10-24-FDOT	19.29	97.413	105.000	0.0002	23728	21.00	140.405	21.09	140.436
DS31	UNIV	10-24-FDOT	21.21	98.495	105.000	0.0002	4437	21.84	67.457	21.86	67.477
DS34	UNIV	10-24-FDOT	15.86	95.340	105.000	0.0001	35577	12.88	83.175	13.01	81.447
DS35-36	UNIV	10-24-FDOT	16.03	95.296	98.000	-0.0001	23049	13.38	114.119	13.39	113.453
HILTON_N10	UNIV	10-24-FDOT	12.00	101.562	103.000	0.0007	114	12.00	5.031	12.00	5.030
HILTON_N20	UNIV	10-24-FDOT	12.01	101.557	103.000	0.0002	13522	7.65	1.853	12.01	0.262
HILTON_N30	UNIV	10-24-FDOT	13.20	100.781	103.000	0.0001	9600	12.00	4.723	13.20	3.121
HILTON_SN10	UNIV	10-24-FDOT	12.00	105.473	106.500	0.0002	113	12.00	1.352	12.00	1.352
HILTON_SN20	UNIV	10-24-FDOT	12.01	105.473	106.500	0.0001	4976	6.95	0.465	0.00	0.000
HILTON_SN30	UNIV	10-24-FDOT	12.00	103.395	106.500	-0.0001	113	12.00	1.344	12.00	1.344
IOA	UNIV	10-24-FDOT	21.35	103.055	105.000	0.0001	4559	12.00	74.110	12.00	72.922
MOTEL6_POND1	UNIV	10-24-FDOT	12.00	103.118	104.000	0.0002	5574	12.00	2.747	12.00	2.744
MOTEL6_POND2	UNIV	10-24-FDOT	15.12	102.323	104.000	0.0001	13585	12.00	2.744	15.12	1.598
NODE-D3	UNIV	10-24-FDOT	22.24	103.455	108.000	0.0017	608	35.16	40.037	35.16	40.061
NODE-D4	UNIV	10-24-FDOT	21.07	102.762	104.230	0.0001	4507	34.03	51.583	34.01	51.765
NODE-D6	UNIV	10-24-FDOT	21.10	102.364	104.100	0.0002	4451	11.62	28.517	11.66	27.444
NODE-F	UNIV	10-24-FDOT	22.36	103.623	108.000	0.0031	489	32.50	23.235	32.51	23.252
NODE-G1	UNIV	10-24-FDOT	21.12	110.892	116.510	-0.0123	3962	12.00	28.086	12.04	61.594
NODE-G2	UNIV	10-24-FDOT	21.08	110.898	125.580	-0.0026	552	12.00	30.540	12.00	30.398
NODE-H1	UNIV	10-24-FDOT	22.29	103.485	105.000	-0.0005	4461	12.02	21.017	41.04	22.208
OVERFLOW	UNIV	10-24-FDOT	21.10	102.364	103.000	0.0001	4484	11.74	30.929	11.76	29.873
POND-A	UNIV	10-24-FDOT	21.21	101.997	105.000	0.0001	157231	12.00	55.585	12.25	27.154
POND-B	UNIV	10-24-FDOT	21.39	102.318	105.000	0.0001	263974	12.00	52.780	11.54	35.845
POND-C	UNIV	10-24-FDOT	21.49	101.865	105.000	0.0001	346466	12.00	85.077	24.57	38.455

Name	Group	Simulation	Max Time Stage hrs	Max Stage ft	Warning Stage ft	Max Delta Stage ft	Max Surf Area ft2	Max Time Inflow hrs	Max Inflow cfs	Max Time Outflow hrs	Max Outflow cfs
POND-D	UNIV	10-24-FDOT	21.44	103.041	105.000	0.0001	478748	12.00	120.700	33.95	62.689
POND-D2	UNIV	10-24-FDOT	21.69	103.133	105.000	0.0001	61019	35.20	41.541	35.26	43.957
POND-D3	UNIV	10-24-FDOT	22.02	103.252	105.000	0.0001	39680	35.16	40.061	35.20	41.541
POND-E1	UNIV	10-24-FDOT	18.19	115.227	116.000	0.0000	32234	18.00	28.511	18.19	28.073
POND-E2	UNIV	10-24-FDOT	19.03	109.876	116.000	0.0003	39014	18.19	34.980	19.01	33.433
POND-F	UNIV	10-24-FDOT	23.76	104.076	108.000	0.0001	220802	12.00	32.216	27.64	24.358
POND-F1	UNIV	10-24-FDOT	21.13	110.891	113.000	0.0002	250269	12.04	107.776	21.06	21.590
POND-F2	UNIV	10-24-FDOT	19.07	104.805	108.000	0.0001	48642	12.00	6.626	16.40	2.650
POND-H	UNIV	10-24-FDOT	24.10	103.679	105.000	0.0000	1056233	12.00	59.408	25.20	35.861
POND-H1	UNIV	10-24-FDOT	22.26	103.514	105.000	0.0001	60611	12.00	8.182	13.10	5.362
POND-I	UNIV	10-24-FDOT	21.33	105.960	106.000	0.0000	423723	12.00	40.556	21.28	31.716
SPG	UNIV	10-24-FDOT	21.05	102.531	106.720	0.0001	4455	17.62	52.101	33.96	51.946
SUPER8_POND	UNIV	10-24-FDOT	12.00	100.818	103.000	0.0001	7247	12.00	2.937	12.00	2.930
US15	UNIV	10-24-FDOT	13.25	104.154	106.000	0.0001	21331	12.00	10.449	13.25	9.888
US16	UNIV	10-24-FDOT	12.11	97.962	102.500	0.0001	9527	12.00	26.188	12.02	25.510
US18	UNIV	10-24-FDOT	27.00	100.473	105.000	0.0001	39363	12.41	3.194	0.00	0.000
US20	UNIV	10-24-FDOT	12.62	97.336	105.000	0.0001	43852	12.24	63.043	12.53	61.052
US21	UNIV	10-24-FDOT	11.79	97.354	102.000	0.0001	4432	12.00	7.624	12.01	7.791
US22	UNIV	10-24-FDOT	19.77	99.390	102.000	0.0001	38033	12.25	8.564	13.58	4.544
US23	UNIV	10-24-FDOT	21.13	99.339	105.000	0.0001	10306	12.00	3.766	12.00	2.251
US26	UNIV	10-24-FDOT	21.33	98.741	102.000	0.0001	128189	12.00	9.495	10.91	4.581
US27	UNIV	10-24-FDOT	12.36	99.026	103.000	0.0001	28619	12.00	4.050	12.36	3.066
US29	UNIV	10-24-FDOT	13.33	97.893	103.000	0.0000	55200	12.00	5.212	13.31	3.670
US30-32	UNIV	10-24-FDOT	21.23	99.253	105.000	0.0001	37202	21.04	143.412	21.33	143.291
US31	UNIV	10-24-FDOT	21.45	98.713	100.000	0.0002	174943	9.79	13.016	24.90	5.123
US33	UNIV	10-24-FDOT	12.41	99.366	105.000	0.0001	64396	12.00	9.541	12.40	7.890
US34	UNIV	10-24-FDOT	12.43	99.158	105.000	0.0004	4359	12.40	7.890	12.43	7.888
US35-36	UNIV	10-24-FDOT	19.07	96.170	105.000	0.0001	18666	19.34	145.011	19.44	145.130
WEIR-E2	UNIV	10-24-FDOT	19.06	108.851	120.000	0.0005	4371	19.01	33.433	19.07	33.427
WEIR-I	UNIV	10-24-FDOT	21.34	105.776	106.000	0.0000	4365	21.28	31.716	21.34	31.714
200	UNIV	100-24-FDOT	13.32	111.687	113.500	0.0001	46152	12.00	13.744	13.32	9.141
200-OUT	UNIV	100-24-FDOT	13.40	107.862	115.000	0.0001	9412	13.32	9.141	13.40	9.137
300	UNIV	100-24-FDOT	17.11	100.260	102.000	0.0001	32086	12.00	5.537	15.26	2.366
400	UNIV	100-24-FDOT	17.09	100.250	103.000	0.0001	38944	12.00	6.226	19.06	3.853
500	UNIV	100-24-FDOT	16.36	103.250	105.000	0.0002	83200	12.00	19.565	15.01	8.734
AW_HOTEL	UNIV	100-24-FDOT	12.00	103.215	104.000	0.0004	4644	12.00	2.399	12.00	2.398
D260	UNIV	100-24-FDOT	12.00	134.657	141.000	-0.0001	3727	12.00	9.008	11.86	9.007
DCS-1	UNIV	100-24-FDOT	21.68	104.136	104.000	0.0007	4362	12.52	36.481	12.45	37.987
DCS-2	UNIV	100-24-FDOT	21.05	102.383	111.500	0.0002	4535	19.00	50.309	19.03	50.154
DCS-3	UNIV	100-24-FDOT	21.06	104.448	107.890	0.0002	4439	24.08	94.057	24.01	94.105
DCS-3A	UNIV	100-24-FDOT	21.44	104.133	106.000	0.0002	4364	24.05	13.020	24.62	13.179
DCS-7	UNIV	100-24-FDOT	21.38	100.922	104.000	0.0002	21800	21.01	155.879	24.01	156.468
DMH-33	UNIV	100-24-FDOT	21.33	101.785	104.000	0.0003	4376	24.01	107.235	24.12	107.361
DOT-1	UNIV	100-24-FDOT	19.14	98.018	100.200	0.0003	4448	12.00	3.122	12.25	2.805
DOT-2	UNIV	100-24-FDOT	19.16	98.015	101.000	0.0003	4799	12.00	3.891	12.18	3.411
DOT-3	UNIV	100-24-FDOT	19.17	98.014	101.000	0.0003	4712	12.04	4.466	12.13	3.982
DPHS	UNIV	100-24-FDOT	0.00	120.000	120.000	0.0000	0	0.00	0.000	18.00	26.000
DS15	UNIV	100-24-FDOT	12.01	102.411	105.000	0.0000	4450	12.00	23.192	12.01	23.173
DS17	UNIV	100-24-FDOT	12.38	98.390	103.000	0.0003	6479	12.00	38.735	12.02	38.066
DS18	UNIV	100-24-FDOT	12.47	98.294	102.000	0.0004	6514	12.03	40.403	12.05	39.718
DS18A	UNIV	100-24-FDOT	12.56	98.165	102.000	0.0002	46329	12.06	45.662	14.03	43.250
DS20	UNIV	100-24-FDOT	12.71	97.568	105.000	0.0005	17121	12.48	88.184	12.53	87.843

Name	Group	Simulation	Max Time Stage hrs	Max Stage ft	Warning Stage ft	Max Delta Stage ft	Max Surf Area ft2	Max Time Inflow hrs	Max Inflow cfs	Max Time Outflow hrs	Max Outflow cfs
DS21	UNIV	100-24-FDOT	12.94	97.290	105.000	0.0006	34620	12.33	98.755	12.49	97.438
DS22	UNIV	100-24-FDOT	21.40	100.744	105.000	0.0001	11464	21.19	16.556	0.00	0.000
DS23	UNIV	100-24-FDOT	21.39	100.670	105.000	0.0001	45700	21.17	22.536	21.36	22.143
DS26	UNIV	100-24-FDOT	22.50	99.573	105.000	-0.0002	40660	9.21	4.807	8.17	8.262
DS27	UNIV	100-24-FDOT	13.24	96.936	105.000	0.0005	59747	12.44	105.079	12.72	102.886
DS29	UNIV	100-24-FDOT	17.36	97.510	105.000	0.0003	41939	21.42	181.501	21.61	182.361
DS30-32	UNIV	100-24-FDOT	19.16	98.015	105.000	0.0003	26581	21.45	176.738	21.70	177.040
DS31	UNIV	100-24-FDOT	21.40	99.490	105.000	0.0003	4389	22.22	80.500	22.35	80.598
DS34	UNIV	100-24-FDOT	15.77	96.368	105.000	0.0002	43668	12.70	118.229	12.73	114.391
DS35-36	UNIV	100-24-FDOT	15.86	96.343	98.000	-0.0002	28783	13.34	150.825	13.35	149.759
HILTON_N10	UNIV	100-24-FDOT	12.00	101.792	103.000	0.0007	114	12.00	7.089	12.00	7.085
HILTON_N20	UNIV	100-24-FDOT	12.21	101.757	103.000	0.0003	14046	5.80	2.542	12.21	0.271
HILTON_N30	UNIV	100-24-FDOT	12.08	101.662	103.000	0.0002	11280	11.33	6.307	12.08	5.681
HILTON_SN10	UNIV	100-24-FDOT	12.00	105.531	106.500	0.0002	113	12.00	1.911	12.00	1.911
HILTON_SN20	UNIV	100-24-FDOT	12.00	105.531	106.500	0.0002	5046	5.36	0.575	0.00	0.000
HILTON_SN30	UNIV	100-24-FDOT	12.07	103.617	106.500	-0.0009	2718	12.00	1.901	12.07	1.827
IOA	UNIV	100-24-FDOT	21.13	105.141	105.000	0.0003	4559	12.00	104.457	12.01	103.049
MOTEL6_POND1	UNIV	100-24-FDOT	12.00	103.152	104.000	0.0004	5636	12.00	3.891	12.00	3.888
MOTEL6_POND2	UNIV	100-24-FDOT	13.22	102.887	104.000	0.0001	14716	12.00	3.888	13.22	2.492
NODE-D3	UNIV	100-24-FDOT	21.95	105.319	108.000	0.0020	608	45.86	35.845	45.86	35.875
NODE-D4	UNIV	100-24-FDOT	21.04	104.870	104.230	0.0002	4507	46.51	53.476	46.49	53.708
NODE-D6	UNIV	100-24-FDOT	22.01	104.663	104.100	0.0002	4451	10.33	28.096	10.40	26.747
NODE-F	UNIV	100-24-FDOT	21.84	105.673	108.000	-0.0032	489	21.70	30.217	21.71	30.216
NODE-G1	UNIV	100-24-FDOT	16.03	112.449	116.510	-0.0123	3268	12.00	40.336	10.42	64.489
NODE-G2	UNIV	100-24-FDOT	16.00	112.484	125.580	-0.0028	552	12.00	43.127	12.00	42.936
NODE-H1	UNIV	100-24-FDOT	22.12	105.288	105.000	-0.0005	4461	10.69	20.873	10.76	19.791
OVERFLOW	UNIV	100-24-FDOT	22.02	104.662	103.000	0.0002	4484	29.98	50.462	29.98	50.618
POND-A	UNIV	100-24-FDOT	21.63	104.139	105.000	0.0002	178811	12.00	78.086	12.52	36.481
POND-B	UNIV	100-24-FDOT	21.45	104.652	105.000	0.0002	263974	12.00	73.803	9.61	36.434
POND-C	UNIV	100-24-FDOT	21.75	104.130	105.000	0.0002	375680	12.00	105.485	24.81	46.832
POND-D	UNIV	100-24-FDOT	21.31	105.109	105.000	0.0002	603692	11.85	149.513	21.51	64.608
POND-D2	UNIV	100-24-FDOT	21.35	105.125	105.000	0.0002	61019	45.86	37.827	45.87	40.890
POND-D3	UNIV	100-24-FDOT	21.48	105.197	105.000	0.0002	39680	45.86	35.875	45.86	37.827
POND-E1	UNIV	100-24-FDOT	18.18	115.250	116.000	0.0000	32234	18.00	29.445	18.18	29.015
POND-E2	UNIV	100-24-FDOT	19.02	110.241	116.000	0.0005	43026	12.00	40.965	18.99	37.067
POND-F	UNIV	100-24-FDOT	21.76	106.689	108.000	0.0001	250293	16.00	65.949	21.54	34.687
POND-F1	UNIV	100-24-FDOT	16.05	112.439	113.000	0.0003	260906	10.42	117.230	16.04	53.812
POND-F2	UNIV	100-24-FDOT	22.02	106.182	108.000	0.0001	57384	12.00	9.419	14.33	3.358
POND-H	UNIV	100-24-FDOT	24.16	105.003	105.000	0.0000	1110013	12.00	82.151	31.74	62.279
POND-H1	UNIV	100-24-FDOT	22.14	105.322	105.000	0.0001	68485	12.00	11.461	12.00	7.788
POND-I	UNIV	100-24-FDOT	21.32	106.275	106.000	0.0001	428109	12.00	52.088	18.56	38.018
SPG	UNIV	100-24-FDOT	21.03	104.723	106.720	0.0002	4455	46.49	53.708	46.46	53.938
SUPER8_POND	UNIV	100-24-FDOT	12.00	100.901	103.000	0.0002	7319	12.00	4.164	12.00	4.159
US15	UNIV	100-24-FDOT	12.27	104.436	106.000	0.0002	26160	12.00	17.408	12.27	17.033
US16	UNIV	100-24-FDOT	12.14	98.666	102.500	0.0002	10191	12.00	35.927	12.01	34.849
US18	UNIV	100-24-FDOT	14.43	100.822	105.000	0.0002	50325	12.25	9.839	14.43	7.065
US20	UNIV	100-24-FDOT	12.55	98.059	105.000	0.0003	51919	12.16	91.431	12.48	88.184
US21	UNIV	100-24-FDOT	12.02	97.765	102.000	0.0002	4378	12.00	11.013	12.00	10.843
US22	UNIV	100-24-FDOT	21.61	100.773	102.000	0.0001	193622	12.25	12.604	12.92	5.719
US23	UNIV	100-24-FDOT	21.40	100.744	105.000	0.0001	11887	12.00	5.412	21.03	17.963
US26	UNIV	100-24-FDOT	22.45	99.590	102.000	0.0001	175100	12.00	13.622	9.21	4.807
US27	UNIV	100-24-FDOT	12.47	99.338	103.000	0.0001	34739	12.00	5.814	12.47	4.195

Name	Group	Simulation	Max Time Stage hrs	Max Stage ft	Warning Stage ft	Max Delta Stage ft	Max Surf Area ft2	Max Time Inflow hrs	Max Inflow cfs	Max Time Outflow hrs	Max Outflow cfs
US29	UNIV	100-24-FDOT	13.39	98.155	103.000	0.0001	67810	12.00	7.512	14.41	6.953
US30-32	UNIV	100-24-FDOT	21.39	100.663	105.000	0.0002	45770	21.09	175.741	21.47	175.349
US31	UNIV	100-24-FDOT	22.50	99.573	100.000	0.0002	286146	12.00	13.741	30.46	7.176
US33	UNIV	100-24-FDOT	12.49	99.611	105.000	0.0002	86121	12.00	13.824	12.49	10.742
US34	UNIV	100-24-FDOT	12.52	99.226	105.000	0.0005	4359	12.49	10.742	12.52	10.741
US35-36	UNIV	100-24-FDOT	17.07	97.313	105.000	0.0001	21714	21.50	183.133	21.64	183.763
WEIR-E2	UNIV	100-24-FDOT	19.07	108.980	120.000	0.0009	4371	18.99	37.067	19.03	37.055
WEIR-I	UNIV	100-24-FDOT	21.34	106.255	106.000	0.0000	4365	18.56	38.018	18.59	37.934
200	UNIV	100-24-SF	12.56	113.090	113.500	0.0007	59240	12.00	73.270	12.56	32.783
200-OUT	UNIV	100-24-SF	12.64	108.421	115.000	0.0005	11398	12.56	32.783	12.64	32.513
300	UNIV	100-24-SF	12.60	101.947	102.000	0.0013	45691	12.04	103.025	12.26	21.906
400	UNIV	100-24-SF	13.25	101.583	103.000	0.0006	51943	12.01	43.166	14.06	16.890
500	UNIV	100-24-SF	14.22	103.988	105.000	0.0007	85773	12.00	116.620	12.97	9.153
AW_HOTEL	UNIV	100-24-SF	12.00	103.610	104.000	0.0003	7564	12.00	17.740	12.00	17.500
D260	UNIV	100-24-SF	12.02	139.437	141.000	-0.0052	927	12.00	66.588	12.02	62.422
DCS-1	UNIV	100-24-SF	16.41	104.489	104.000	0.0011	4362	12.35	70.730	12.40	65.536
DCS-2	UNIV	100-24-SF	14.22	102.815	111.500	0.0017	4535	12.00	82.196	12.06	69.354
DCS-3	UNIV	100-24-SF	12.07	107.895	107.890	0.0029	4439	12.00	168.036	12.04	147.710
DCS-3A	UNIV	100-24-SF	14.44	104.336	106.000	0.0009	4364	12.57	14.225	24.82	13.092
DCS-7	UNIV	100-24-SF	14.48	101.388	104.000	0.0007	21800	12.07	213.509	12.11	187.728
DMH-33	UNIV	100-24-SF	14.69	102.147	104.000	0.0010	4376	12.04	150.409	12.08	144.193
DOT-1	UNIV	100-24-SF	14.71	98.970	100.200	0.0009	4373	12.25	15.200	12.33	13.160
DOT-2	UNIV	100-24-SF	14.71	98.966	101.000	0.0009	4438	12.32	15.436	12.38	14.369
DOT-3	UNIV	100-24-SF	14.71	98.964	101.000	0.0009	4436	12.10	18.681	12.13	16.661
DPHS	UNIV	100-24-SF	0.00	120.000	120.000	0.0000	0	0.00	0.000	18.00	26.000
DS15	UNIV	100-24-SF	12.26	105.397	105.000	0.0025	8862	12.25	63.319	12.25	62.654
DS17	UNIV	100-24-SF	13.05	101.382	103.000	0.0008	4498	11.95	85.920	11.97	81.019
DS18	UNIV	100-24-SF	13.03	101.155	102.000	0.0009	4475	11.98	83.999	12.00	78.510
DS18A	UNIV	100-24-SF	13.03	100.820	102.000	0.0007	73563	12.01	103.475	14.13	92.239
DS20	UNIV	100-24-SF	13.22	98.911	105.000	0.0004	20573	12.93	182.345	12.99	180.967
DS21	UNIV	100-24-SF	13.30	98.645	105.000	0.0004	43755	12.90	205.869	13.05	202.333
DS22	UNIV	100-24-SF	14.43	101.397	105.000	0.0006	12198	12.48	16.692	0.00	0.000
DS23	UNIV	100-24-SF	14.46	101.180	105.000	0.0007	50628	14.08	55.348	14.27	53.335
DS26	UNIV	100-24-SF	20.39	99.839	105.000	0.0004	42970	12.68	6.701	10.71	7.531
DS27	UNIV	100-24-SF	13.44	98.263	105.000	0.0004	75532	12.99	214.107	13.24	208.969
DS29	UNIV	100-24-SF	16.02	98.537	105.000	0.0005	48636	12.25	209.322	12.39	190.956
DS30-32	UNIV	100-24-SF	16.00	98.681	105.000	0.0004	41439	12.20	182.254	12.30	176.100
DS31	UNIV	100-24-SF	16.07	99.910	105.000	0.0004	4389	23.52	80.404	23.42	80.489
DS34	UNIV	100-24-SF	13.92	97.459	105.000	0.0005	53280	13.17	231.042	13.30	226.271
DS35-36	UNIV	100-24-SF	13.95	97.420	98.000	0.0005	53695	13.38	264.674	13.49	261.446
HILTON_N10	UNIV	100-24-SF	12.11	103.453	103.000	-0.0424	65098	12.00	52.448	11.73	37.045
HILTON_N20	UNIV	100-24-SF	12.43	102.700	103.000	0.0003	24043	12.08	8.102	12.04	0.290
HILTON_N30	UNIV	100-24-SF	12.30	102.498	103.000	0.0013	12846	11.73	32.248	12.09	26.003
HILTON_SN10	UNIV	100-24-SF	12.00	106.423	106.500	0.0005	113	12.00	14.141	12.00	14.110
HILTON_SN20	UNIV	100-24-SF	12.22	105.773	106.500	0.0001	5331	12.00	0.751	0.00	0.000
HILTON_SN30	UNIV	100-24-SF	12.03	105.301	106.500	-0.0021	4845	12.00	13.358	12.03	12.138
IOA	UNIV	100-24-SF	12.29	112.771	105.000	0.0043	4559	12.25	535.554	12.28	511.161
MOTEL6_POND1	UNIV	100-24-SF	12.19	103.926	104.000	0.0003	7052	12.00	28.804	11.92	25.813
MOTEL6_POND2	UNIV	100-24-SF	12.21	103.890	104.000	0.0008	16842	11.92	25.813	12.21	11.216
NODE-D3	UNIV	100-24-SF	16.37	105.397	108.000	0.0014	608	12.02	44.524	12.02	43.780
NODE-D4	UNIV	100-24-SF	12.07	107.918	104.230	0.0027	4507	13.42	53.185	13.45	53.069
NODE-D6	UNIV	100-24-SF	12.09	109.271	104.100	0.0031	4451	12.00	102.343	12.12	79.872

Name	Group	Simulation	Max Time Stage hrs	Max Stage ft	Warning Stage ft	Max Delta Stage ft	Max Surf Area ft2	Max Time Inflow hrs	Max Inflow cfs	Max Time Outflow hrs	Max Outflow cfs
NODE-F	UNIV	100-24-SF	16.46	105.768	108.000	0.0034	489	16.81	31.037	16.82	31.040
NODE-G1	UNIV	100-24-SF	12.45	113.190	116.510	-0.0123	3821	12.00	281.871	12.00	273.151
NODE-G2	UNIV	100-24-SF	12.01	119.585	125.580	0.0050	552	12.00	302.904	12.00	298.741
NODE-H1	UNIV	100-24-SF	16.48	105.361	105.000	0.0011	4461	12.02	34.088	12.13	28.837
OVERFLOW	UNIV	100-24-SF	12.08	107.462	103.000	0.0027	4484	27.89	51.268	27.90	51.425
POND-A	UNIV	100-24-SF	12.58	104.566	105.000	0.0012	183455	12.25	403.322	12.56	190.337
POND-B	UNIV	100-24-SF	13.04	105.305	105.000	0.0010	263974	12.00	518.632	12.79	55.994
POND-C	UNIV	100-24-SF	16.41	104.489	105.000	0.0008	380522	12.00	364.809	24.83	47.016
POND-D	UNIV	100-24-SF	14.13	105.253	105.000	0.0012	618239	12.25	679.506	14.26	93.498
POND-D2	UNIV	100-24-SF	14.16	105.258	105.000	0.0010	61019	11.94	34.493	30.00	34.077
POND-D3	UNIV	100-24-SF	14.41	105.285	105.000	0.0009	39680	12.00	63.790	30.00	31.830
POND-E1	UNIV	100-24-SF	12.09	115.803	116.000	0.0003	32234	12.00	67.960	12.09	55.761
POND-E2	UNIV	100-24-SF	12.68	112.488	116.000	0.0012	270932	12.00	216.134	12.40	54.103
POND-F	UNIV	100-24-SF	16.66	106.794	108.000	0.0006	251531	12.00	197.040	16.66	35.012
POND-F1	UNIV	100-24-SF	12.56	113.078	113.000	0.0014	265608	12.00	744.622	12.56	155.780
POND-F2	UNIV	100-24-SF	16.14	106.706	108.000	0.0006	60805	12.00	69.753	12.49	4.193
POND-H	UNIV	100-24-SF	22.14	105.269	105.000	0.0003	1120568	12.00	462.299	30.00	63.439
POND-H1	UNIV	100-24-SF	16.42	105.402	105.000	0.0005	68834	12.00	84.738	12.15	20.050
POND-I	UNIV	100-24-SF	17.41	106.490	106.000	0.0002	431110	12.00	186.214	15.81	39.923
SPG	UNIV	100-24-SF	12.07	108.088	106.720	0.0029	4455	13.05	65.197	13.08	65.190
SUPER8_POND	UNIV	100-24-SF	12.04	101.973	103.000	-0.0005	8676	12.00	30.823	12.04	27.484
US15	UNIV	100-24-SF	12.31	105.378	106.000	0.0006	46555	12.25	61.730	12.42	62.569
US16	UNIV	100-24-SF	12.60	101.952	102.500	0.0017	38382	12.00	130.611	12.02	124.653
US18	UNIV	100-24-SF	12.88	101.773	105.000	0.0010	65369	12.31	73.601	12.82	47.122
US20	UNIV	100-24-SF	13.02	100.802	105.000	0.0007	106578	12.50	230.921	12.93	182.345
US21	UNIV	100-24-SF	12.43	100.746	102.000	0.0024	163861	12.00	74.553	12.02	27.037
US22	UNIV	100-24-SF	14.28	101.486	102.000	0.0007	278029	12.68	78.469	13.37	6.351
US23	UNIV	100-24-SF	14.43	101.396	105.000	0.0006	12621	12.00	28.115	12.48	23.860
US26	UNIV	100-24-SF	20.57	99.854	102.000	0.0003	189706	12.25	71.210	12.68	6.701
US27	UNIV	100-24-SF	12.58	100.402	103.000	0.0004	55730	12.00	40.104	12.58	8.345
US29	UNIV	100-24-SF	13.37	98.887	103.000	0.0003	103044	12.25	38.524	12.46	8.636
US30-32	UNIV	100-24-SF	14.48	101.155	105.000	0.0007	48810	12.25	196.166	14.12	175.969
US31	UNIV	100-24-SF	20.39	99.839	100.000	0.0004	312981	12.25	59.963	30.00	8.146
US33	UNIV	100-24-SF	12.88	100.452	105.000	0.0003	230322	12.00	73.068	12.88	17.957
US34	UNIV	100-24-SF	12.90	99.375	105.000	0.0004	4359	12.88	17.957	12.90	17.956
US35-36	UNIV	100-24-SF	16.02	98.484	105.000	0.0006	24961	12.39	203.388	12.39	191.229
WEIR-E2	UNIV	100-24-SF	13.10	109.854	120.000	0.0004	4371	12.40	54.103	12.56	53.669
WEIR-I	UNIV	100-24-SF	17.43	106.475	106.000	0.0002	4365	15.81	39.923	15.88	39.802
200	UNIV	100yr24hr	10.06	112.705	113.500	0.0005	52710	9.00	28.213	10.06	19.207
200-OUT	UNIV	100yr24hr	10.13	108.147	115.000	0.0001	10377	10.06	19.207	10.13	19.170
300	UNIV	100yr24hr	10.26	101.193	102.000	0.0004	41403	10.00	20.146	10.13	11.103
400	UNIV	100yr24hr	10.44	100.960	103.000	0.0004	47930	10.00	16.228	10.67	12.937
500	UNIV	100yr24hr	13.04	103.957	105.000	0.0006	85665	8.83	40.095	10.60	8.998
AW_HOTEL	UNIV	100yr24hr	8.56	103.348	104.000	0.0005	5628	8.50	4.944	8.56	4.933
D260	UNIV	100yr24hr	8.54	135.329	141.000	-0.0003	3698	8.50	18.588	8.54	18.556
DCS-1	UNIV	100yr24hr	14.20	104.744	104.000	0.0006	4362	9.27	57.591	9.41	55.523
DCS-2	UNIV	100yr24hr	13.05	103.023	111.500	0.0007	4535	10.17	55.044	10.18	54.031
DCS-3	UNIV	100yr24hr	14.00	104.730	107.890	0.0010	4439	9.00	97.675	8.68	96.127
DCS-3A	UNIV	100yr24hr	13.37	104.393	106.000	0.0007	4364	10.21	13.331	21.54	12.903
DCS-7	UNIV	100yr24hr	13.36	101.475	104.000	0.0005	21800	10.07	157.104	20.04	155.496
DMH-33	UNIV	100yr24hr	13.40	102.267	104.000	0.0006	4376	22.01	106.465	21.06	106.577
DOT-1	UNIV	100yr24hr	13.46	99.188	100.200	0.0005	4373	9.00	6.411	9.17	5.801

Name	Group	Simulation	Max Time Stage hrs	Max Stage ft	Warning Stage ft	Max Delta Stage ft	Max Surf Area ft2	Max Time Inflow hrs	Max Inflow cfs	Max Time Outflow hrs	Max Outflow cfs
DOT-2	UNIV	100yr24hr	13.46	99.184	101.000	0.0006	4438	9.00	8.243	9.05	7.330
DOT-3	UNIV	100yr24hr	13.46	99.182	101.000	0.0006	4436	9.00	9.750	9.01	8.812
DPHS	UNIV	100yr24hr	0.00	120.000	120.000	0.0000	0	0.00	0.000	18.00	26.000
DS15	UNIV	100yr24hr	9.17	104.100	105.000	0.0006	4362	8.87	39.659	9.17	37.184
DS17	UNIV	100yr24hr	10.28	100.639	103.000	0.0004	4498	8.76	59.796	8.71	57.780
DS18	UNIV	100yr24hr	10.26	100.383	102.000	0.0005	4475	10.27	66.977	10.32	67.033
DS18A	UNIV	100yr24hr	10.24	99.991	102.000	0.0005	64796	10.03	76.306	10.85	80.793
DS20	UNIV	100yr24hr	10.27	98.611	105.000	0.0005	19694	10.16	152.364	10.34	152.274
DS21	UNIV	100yr24hr	10.26	98.351	105.000	0.0007	41784	10.02	171.375	10.13	169.777
DS22	UNIV	100yr24hr	13.35	101.252	105.000	0.0006	12035	11.49	22.940	0.00	0.000
DS23	UNIV	100yr24hr	13.35	101.259	105.000	0.0005	51398	11.49	56.349	11.74	53.605
DS26	UNIV	100yr24hr	16.06	99.887	105.000	0.0005	43389	7.91	6.713	7.23	7.061
DS27	UNIV	100yr24hr	10.33	97.993	105.000	0.0006	72379	10.00	183.231	10.21	179.807
DS29	UNIV	100yr24hr	13.80	98.582	105.000	0.0003	48946	18.56	178.285	18.94	182.229
DS30-32	UNIV	100yr24hr	13.73	98.728	105.000	0.0003	42474	19.07	172.025	19.05	173.361
DS31	UNIV	100yr24hr	13.55	100.008	105.000	0.0004	4389	20.08	79.843	20.06	79.966
DS34	UNIV	100yr24hr	11.15	97.255	105.000	0.0004	51420	10.03	204.094	10.19	199.999
DS35-36	UNIV	100yr24hr	11.17	97.220	98.000	0.0005	43546	10.29	239.402	10.34	237.639
HILTON_N10	UNIV	100yr24hr	9.00	102.312	103.000	0.0011	114	8.50	14.592	8.50	14.585
HILTON_N20	UNIV	100yr24hr	9.20	102.206	103.000	0.0004	15219	6.10	3.347	8.50	0.280
HILTON_N30	UNIV	100yr24hr	9.02	102.004	103.000	0.0007	11922	9.00	12.917	9.01	12.674
HILTON_SN10	UNIV	100yr24hr	9.00	105.696	106.500	0.0004	113	8.50	3.930	8.50	3.929
HILTON_SN20	UNIV	100yr24hr	9.06	105.682	106.500	0.0003	5224	5.71	0.682	0.00	0.000
HILTON_SN30	UNIV	100yr24hr	9.03	104.658	106.500	-0.0024	4033	9.00	3.802	9.03	3.710
IOA	UNIV	100yr24hr	10.19	105.555	105.000	0.0012	4559	9.00	214.696	9.02	211.432
MOTEL6_POND1	UNIV	100yr24hr	10.01	103.676	104.000	0.0005	6595	8.50	7.996	8.53	7.984
MOTEL6_POND2	UNIV	100yr24hr	10.03	103.658	104.000	0.0005	16346	8.53	7.984	10.03	5.201
NODE-D3	UNIV	100yr24hr	14.06	105.533	108.000	0.0020	608	42.61	34.774	42.62	34.805
NODE-D4	UNIV	100yr24hr	13.02	105.097	104.230	0.0010	4507	43.75	52.938	43.72	53.175
NODE-D6	UNIV	100yr24hr	14.01	104.999	104.100	0.0008	4451	7.62	48.438	7.60	45.315
NODE-F	UNIV	100yr24hr	14.09	105.991	108.000	-0.0033	489	14.20	34.353	14.22	34.358
NODE-G1	UNIV	100yr24hr	10.09	112.979	116.510	-0.0123	3734	9.00	82.831	8.08	94.050
NODE-G2	UNIV	100yr24hr	10.00	113.235	125.580	-0.0027	552	8.67	88.458	8.67	88.019
NODE-H1	UNIV	100yr24hr	14.13	105.496	105.000	0.0013	4461	8.41	24.917	8.52	22.456
OVERFLOW	UNIV	100yr24hr	14.04	104.938	103.000	0.0009	4484	26.46	50.961	26.46	51.117
POND-A	UNIV	100yr24hr	14.20	104.744	105.000	0.0007	185397	9.00	160.034	10.14	99.891
POND-B	UNIV	100yr24hr	13.32	105.069	105.000	0.0005	263974	8.50	151.846	7.49	50.278
POND-C	UNIV	100yr24hr	14.20	104.743	105.000	0.0006	383959	10.01	196.818	16.51	47.001
POND-D	UNIV	100yr24hr	11.65	105.279	105.000	0.0008	620842	8.70	278.029	11.65	99.501
POND-D2	UNIV	100yr24hr	13.21	105.288	105.000	0.0008	61019	42.68	36.785	42.69	39.867
POND-D3	UNIV	100yr24hr	13.42	105.376	105.000	0.0008	39680	8.28	38.393	42.68	36.785
POND-E1	UNIV	100yr24hr	18.20	115.184	116.000	0.0001	32234	18.00	26.807	18.20	26.405
POND-E2	UNIV	100yr24hr	9.76	111.656	116.000	0.0005	138708	9.00	66.977	9.44	49.414
POND-F	UNIV	100yr24hr	14.13	107.293	108.000	0.0004	257275	10.02	151.217	14.10	42.241
POND-F1	UNIV	100yr24hr	10.16	112.917	113.000	0.0010	264447	9.00	217.869	10.15	123.862
POND-F2	UNIV	100yr24hr	14.09	106.731	108.000	0.0004	60970	8.50	19.332	9.70	3.791
POND-H	UNIV	100yr24hr	17.36	105.195	105.000	0.0001	1117649	9.00	146.448	29.19	63.982
POND-H1	UNIV	100yr24hr	14.10	105.545	105.000	0.0003	69457	8.50	23.636	9.01	12.382
POND-I	UNIV	100yr24hr	13.04	106.282	106.000	0.0002	428219	9.00	85.504	11.13	40.292
SPG	UNIV	100yr24hr	13.02	104.982	106.720	0.0010	4455	10.83	66.454	10.85	65.832
SUPER8_POND	UNIV	100yr24hr	9.00	101.133	103.000	0.0003	7579	8.50	8.554	9.00	8.529
US15	UNIV	100yr24hr	10.16	104.779	106.000	0.0003	32732	10.00	33.179	10.02	32.713

Name	Group	Simulation	Max Time Stage hrs	Max Stage ft	Warning Stage ft	Max Delta Stage ft	Max Surf Area ft2	Max Time Inflow hrs	Max Inflow cfs	Max Time Outflow hrs	Max Outflow cfs
US16	UNIV	100yr24hr	10.24	101.200	102.500	0.0009	18625	9.00	62.957	9.06	61.147
US18	UNIV	100yr24hr	10.44	101.235	105.000	0.0005	57556	9.27	25.885	10.35	21.945
US20	UNIV	100yr24hr	10.23	99.948	105.000	0.0005	82563	9.50	159.913	10.16	152.364
US21	UNIV	100yr24hr	9.09	100.020	102.000	0.0005	8640	9.00	22.630	9.01	21.571
US22	UNIV	100yr24hr	13.43	101.203	102.000	0.0006	253789	9.91	30.796	9.06	5.462
US23	UNIV	100yr24hr	13.35	101.252	105.000	0.0006	12458	9.00	11.107	12.64	25.163
US26	UNIV	100yr24hr	16.44	99.892	102.000	0.0002	191792	9.00	27.959	7.91	6.713
US27	UNIV	100yr24hr	10.12	100.083	103.000	0.0002	49430	9.00	11.939	10.12	7.113
US29	UNIV	100yr24hr	11.55	98.754	103.000	0.0001	96588	9.00	15.426	9.43	8.337
US30-32	UNIV	100yr24hr	13.36	101.236	105.000	0.0005	49302	11.23	180.785	11.68	175.899
US31	UNIV	100yr24hr	16.06	99.887	100.000	0.0005	317852	9.00	26.827	27.16	8.302
US33	UNIV	100yr24hr	10.29	100.211	105.000	0.0003	171705	9.00	28.401	10.29	16.147
US34	UNIV	100yr24hr	10.31	99.340	105.000	0.0007	4359	10.29	16.147	10.31	16.146
US35-36	UNIV	100yr24hr	13.83	98.529	105.000	0.0006	25088	18.94	182.499	18.91	185.209
WEIR-E2	UNIV	100yr24hr	10.19	109.473	120.000	0.0005	4371	9.44	49.414	9.28	49.996
WEIR-I	UNIV	100yr24hr	13.07	106.263	106.000	0.0002	4365	11.13	40.292	11.19	40.128
200	UNIV	100YR72HR	60.55	112.908	113.500	0.0007	56147	60.17	64.724	60.55	26.781
200-OUT	UNIV	100YR72HR	60.63	108.306	115.000	0.0002	11012	60.55	26.781	60.63	26.443
300	UNIV	100YR72HR	60.56	101.616	102.000	0.0009	43808	60.05	75.224	60.28	18.771
400	UNIV	100YR72HR	61.11	101.254	103.000	0.0004	49960	60.01	32.900	61.58	14.944
500	UNIV	100YR72HR	61.47	104.756	105.000	0.0006	92070	60.00	98.918	60.64	10.350
AW_HOTEL	UNIV	100YR72HR	60.00	103.580	104.000	0.0003	7348	60.00	13.602	60.00	13.534
D260	UNIV	100YR72HR	60.00	137.419	141.000	0.0030	1094	60.00	50.955	60.00	50.837
DCS-1	UNIV	100YR72HR	64.28	104.209	104.000	0.0011	4362	60.38	62.372	60.43	58.798
DCS-2	UNIV	100YR72HR	62.12	102.705	111.500	0.0012	4535	60.00	72.525	60.08	63.834
DCS-3	UNIV	100YR72HR	60.05	106.719	107.890	0.0022	4439	60.00	143.492	60.02	132.744
DCS-3A	UNIV	100YR72HR	61.73	104.385	106.000	0.0008	4364	60.46	14.542	72.56	12.985
DCS-7	UNIV	100YR72HR	61.87	101.437	104.000	0.0005	21800	60.06	198.567	60.09	177.684
DMH-33	UNIV	100YR72HR	62.01	102.169	104.000	0.0008	4376	60.02	139.821	60.05	134.871
DOT-1	UNIV	100YR72HR	62.09	99.032	100.200	0.0008	4373	60.33	12.427	60.36	11.353
DOT-2	UNIV	100YR72HR	62.09	99.027	101.000	0.0008	4438	60.09	13.163	60.37	12.284
DOT-3	UNIV	100YR72HR	62.09	99.025	101.000	0.0008	4436	60.04	16.203	60.09	14.104
DPHS	UNIV	100YR72HR	0.00	120.000	120.000	0.0000	0	0.00	0.000	18.00	26.000
DS15	UNIV	100YR72HR	60.18	105.306	105.000	0.0023	7832	59.89	58.510	60.17	57.246
DS17	UNIV	100YR72HR	60.96	101.023	103.000	0.0012	4498	59.96	84.642	59.98	80.197
DS18	UNIV	100YR72HR	60.97	100.782	102.000	0.0011	4475	60.01	83.863	60.03	78.896
DS18A	UNIV	100YR72HR	60.99	100.417	102.000	0.0007	69312	60.05	103.256	61.74	87.248
DS20	UNIV	100YR72HR	61.16	98.770	105.000	0.0004	20162	60.89	168.874	60.95	167.513
DS21	UNIV	100YR72HR	61.24	98.510	105.000	0.0004	42841	60.87	191.779	61.00	188.386
DS22	UNIV	100YR72HR	62.01	101.352	105.000	0.0006	12148	61.71	25.827	0.00	0.000
DS23	UNIV	100YR72HR	61.81	101.250	105.000	0.0006	51285	61.30	73.389	61.48	68.224
DS26	UNIV	100YR72HR	67.23	99.751	105.000	0.0002	42210	60.59	6.467	50.75	7.471
DS27	UNIV	100YR72HR	61.35	98.135	105.000	0.0004	74048	60.97	198.912	61.21	194.293
DS29	UNIV	100YR72HR	63.16	98.473	105.000	0.0004	48211	60.23	204.560	60.34	185.628
DS30-32	UNIV	100YR72HR	62.89	98.638	105.000	0.0003	40489	60.17	181.910	60.21	175.151
DS31	UNIV	100YR72HR	62.24	99.908	105.000	0.0004	4389	69.57	79.875	69.57	80.005
DS34	UNIV	100YR72HR	61.63	97.341	105.000	0.0005	52285	61.16	215.033	61.24	211.261
DS35-36	UNIV	100YR72HR	61.65	97.301	98.000	0.0005	47664	61.32	252.260	61.40	249.793
HILTON_N10	UNIV	100YR72HR	60.06	103.299	103.000	-0.0465	43035	60.00	40.298	59.76	35.872
HILTON_N20	UNIV	100YR72HR	60.31	102.393	103.000	0.0002	15707	60.03	6.520	60.08	0.288
HILTON_N30	UNIV	100YR72HR	60.14	102.407	103.000	0.0013	12676	59.76	31.080	60.13	24.864
HILTON_SN10	UNIV	100YR72HR	60.00	106.164	106.500	0.0005	113	60.00	10.882	60.00	10.876

Name	Group	Simulation	Max Time Stage hrs	Max Stage ft	Warning Stage ft	Max Delta Stage ft	Max Surf Area ft2	Max Time Inflow hrs	Max Inflow cfs	Max Time Outflow hrs	Max Outflow cfs
HILTON_SN20	UNIV	100YR72HR	60.19	105.719	106.500	0.0001	5267	59.84	0.645	0.00	0.000
HILTON_SN30	UNIV	100YR72HR	60.02	105.142	106.500	-0.0027	4644	60.00	10.255	60.02	9.667
IOA	UNIV	100YR72HR	60.26	110.629	105.000	0.0034	4559	60.17	446.771	60.21	430.013
MOTEL6_POND1	UNIV	100YR72HR	60.16	103.837	104.000	0.0003	6890	60.00	22.193	59.86	21.497
MOTEL6_POND2	UNIV	100YR72HR	60.18	103.808	104.000	0.0006	16667	59.86	21.497	60.18	8.842
NODE-D3	UNIV	100YR72HR	62.40	105.391	108.000	0.0016	608	59.88	36.377	59.88	35.867
NODE-D4	UNIV	100YR72HR	60.05	106.790	104.230	0.0023	4507	61.19	56.232	61.21	56.286
NODE-D6	UNIV	100YR72HR	60.07	107.751	104.100	-0.0030	4451	60.00	79.782	60.16	69.159
NODE-F	UNIV	100YR72HR	63.57	105.783	108.000	0.0030	489	63.97	32.405	63.97	32.405
NODE-G1	UNIV	100YR72HR	60.16	113.481	116.510	-0.0123	3686	60.00	229.002	60.00	222.042
NODE-G2	UNIV	100YR72HR	60.00	117.534	125.580	0.0043	552	60.00	241.465	60.00	239.506
NODE-H1	UNIV	100YR72HR	64.09	105.328	105.000	0.0006	4461	59.92	25.154	59.85	21.434
OVERFLOW	UNIV	100YR72HR	60.07	106.428	103.000	0.0022	4484	76.69	48.549	76.69	48.721
POND-A	UNIV	100YR72HR	60.61	104.431	105.000	0.0013	181987	60.17	362.042	60.59	141.163
POND-B	UNIV	100YR72HR	61.21	104.737	105.000	0.0008	263974	60.00	410.844	60.86	42.820
POND-C	UNIV	100YR72HR	64.28	104.207	105.000	0.0007	376722	60.09	314.743	72.79	45.727
POND-D	UNIV	100YR72HR	61.32	105.334	105.000	0.0011	626313	60.17	598.748	61.34	117.517
POND-D2	UNIV	100YR72HR	61.34	105.335	105.000	0.0008	61019	90.86	37.841	90.89	40.988
POND-D3	UNIV	100YR72HR	61.50	105.342	105.000	0.0008	39680	59.88	51.156	90.86	37.841
POND-E1	UNIV	100YR72HR	60.10	115.433	116.000	0.0003	32234	60.00	46.928	60.10	36.907
POND-E2	UNIV	100YR72HR	60.49	112.035	116.000	0.0011	221625	60.00	164.248	60.31	52.190
POND-F	UNIV	100YR72HR	63.95	106.910	108.000	0.0007	252898	60.30	220.642	63.79	37.600
POND-F1	UNIV	100YR72HR	60.33	113.221	113.000	0.0011	266601	60.00	600.225	60.33	187.035
POND-F2	UNIV	100YR72HR	62.60	106.732	108.000	0.0005	60975	60.00	53.851	60.25	4.183
POND-H	UNIV	100YR72HR	68.04	104.932	105.000	0.0002	1107136	60.00	356.830	76.69	54.118
POND-H1	UNIV	100YR72HR	64.04	105.379	105.000	0.0004	68734	60.00	64.903	60.09	15.829
POND-I	UNIV	100YR72HR	62.75	106.097	106.000	0.0002	425636	60.00	149.711	62.50	33.345
SPG	UNIV	100YR72HR	60.05	106.920	106.720	0.0022	4455	60.94	69.587	60.77	69.631
SUPER8_POND	UNIV	100YR72HR	60.01	101.730	103.000	0.0005	8360	60.00	23.758	60.01	22.814
US15	UNIV	100YR72HR	60.23	105.296	106.000	0.0005	44065	60.17	57.409	60.28	54.081
US16	UNIV	100YR72HR	60.56	101.622	102.500	0.0016	29712	60.00	113.160	60.03	108.079
US18	UNIV	100YR72HR	60.76	101.644	105.000	0.0008	63395	60.24	64.448	60.69	41.861
US20	UNIV	100YR72HR	60.98	100.391	105.000	0.0007	94834	60.33	205.833	60.89	168.874
US21	UNIV	100YR72HR	60.31	100.636	102.000	0.0023	140395	60.00	61.520	60.05	26.916
US22	UNIV	100YR72HR	62.07	101.379	102.000	0.0007	268955	60.55	69.959	72.95	5.414
US23	UNIV	100YR72HR	62.01	101.352	105.000	0.0006	12571	60.17	25.548	62.02	27.925
US26	UNIV	100YR72HR	68.05	99.767	102.000	0.0003	184906	60.17	62.452	60.59	6.467
US27	UNIV	100YR72HR	60.52	100.203	103.000	0.0003	51797	60.00	32.686	60.52	7.581
US29	UNIV	100YR72HR	61.35	98.736	103.000	0.0003	95761	60.17	32.672	60.35	7.868
US30-32	UNIV	100YR72HR	61.85	101.213	105.000	0.0006	49183	60.17	196.804	61.41	181.172
US31	UNIV	100YR72HR	67.22	99.751	100.000	0.0002	304148	60.17	53.396	79.23	8.160
US33	UNIV	100YR72HR	60.79	100.341	105.000	0.0002	203262	60.17	65.852	60.78	17.140
US34	UNIV	100YR72HR	60.81	99.359	105.000	0.0003	4359	60.78	17.140	60.81	17.139
US35-36	UNIV	100YR72HR	63.22	98.413	105.000	0.0005	24762	60.33	196.833	60.44	187.328
WEIR-E2	UNIV	100YR72HR	60.71	109.566	120.000	0.0005	4371	60.31	52.190	60.44	51.871
WEIR-I	UNIV	100YR72HR	62.80	106.003	106.000	0.0001	4365	62.50	33.345	62.55	33.238
200	UNIV	25-24-FDOT	13.78	111.247	113.500	0.0001	44491	12.00	11.034	13.78	6.793
200-OUT	UNIV	25-24-FDOT	13.95	107.774	115.000	0.0001	9085	13.78	6.793	13.95	6.792
300	UNIV	25-24-FDOT	19.12	99.834	102.000	0.0001	28429	12.00	4.463	15.25	1.801
400	UNIV	25-24-FDOT	19.13	99.827	103.000	0.0001	34704	12.00	4.882	19.17	2.917
500	UNIV	25-24-FDOT	19.12	102.960	105.000	0.0001	82173	12.00	15.799	19.11	6.050
AW_HOTEL	UNIV	25-24-FDOT	12.00	103.187	104.000	0.0002	4433	12.00	1.939	12.00	1.939

Name	Group	Simulation	Max Time Stage hrs	Max Stage ft	Warning Stage ft	Max Delta Stage ft	Max Surf Area ft2	Max Time Inflow hrs	Max Inflow cfs	Max Time Outflow hrs	Max Outflow cfs
D260	UNIV	25-24-FDOT	12.00	134.516	141.000	-0.0001	3650	12.00	7.298	11.97	7.298
DCS-1	UNIV	25-24-FDOT	21.43	102.755	104.000	0.0007	4362	12.28	29.450	12.34	28.662
DCS-2	UNIV	25-24-FDOT	21.02	101.228	111.500	0.0001	4535	21.00	44.759	21.01	44.713
DCS-3	UNIV	25-24-FDOT	21.05	103.120	107.890	0.0002	4439	21.00	87.485	23.95	87.641
DCS-3A	UNIV	25-24-FDOT	21.46	102.881	106.000	0.0001	4364	21.12	12.265	24.51	12.383
DCS-7	UNIV	25-24-FDOT	21.14	99.998	104.000	0.0001	21800	21.03	144.266	21.07	144.183
DMH-33	UNIV	25-24-FDOT	21.11	100.765	104.000	0.0002	4376	23.95	100.010	22.04	99.654
DOT-1	UNIV	25-24-FDOT	19.32	97.608	100.200	0.0001	4596	12.00	2.501	11.77	2.233
DOT-2	UNIV	25-24-FDOT	19.33	97.606	101.000	0.0001	5594	11.77	3.258	11.56	2.993
DOT-3	UNIV	25-24-FDOT	19.34	97.606	101.000	0.0002	5613	11.56	3.913	11.52	3.727
DPHS	UNIV	25-24-FDOT	0.00	120.000	120.000	0.0000	0	0.00	0.000	18.00	26.000
DS15	UNIV	25-24-FDOT	12.01	102.343	105.000	0.0000	4451	12.00	19.470	12.01	19.441
DS17	UNIV	25-24-FDOT	12.38	97.950	103.000	0.0002	6981	12.01	31.737	12.04	31.133
DS18	UNIV	25-24-FDOT	12.49	97.850	102.000	0.0003	6675	12.05	32.675	12.08	32.097
DS18A	UNIV	25-24-FDOT	12.61	97.723	102.000	0.0001	41683	12.09	35.760	13.13	33.830
DS20	UNIV	25-24-FDOT	12.70	97.206	105.000	0.0003	16161	12.51	70.384	12.57	70.136
DS21	UNIV	25-24-FDOT	12.85	96.910	105.000	0.0004	32061	12.36	78.784	12.58	77.848
DS22	UNIV	25-24-FDOT	20.11	99.867	105.000	0.0001	10477	11.70	1.541	0.00	0.000
DS23	UNIV	25-24-FDOT	21.15	99.735	105.000	0.0001	37551	18.53	12.666	18.49	11.951
DS26	UNIV	25-24-FDOT	22.05	98.984	105.000	-0.0001	35530	10.24	4.586	9.15	7.735
DS27	UNIV	25-24-FDOT	13.05	96.526	105.000	0.0004	54344	12.57	84.026	12.86	82.951
DS29	UNIV	25-24-FDOT	19.20	96.861	105.000	0.0002	37670	19.36	158.249	21.10	158.540
DS30-32	UNIV	25-24-FDOT	19.36	97.613	105.000	0.0002	24505	21.00	154.307	21.08	154.364
DS31	UNIV	25-24-FDOT	21.15	98.817	105.000	0.0002	4414	21.42	72.664	21.50	72.696
DS34	UNIV	25-24-FDOT	15.75	95.652	105.000	0.0001	38023	12.82	95.437	12.98	93.339
DS35-36	UNIV	25-24-FDOT	15.98	95.615	98.000	-0.0001	24808	13.19	128.320	13.23	127.276
HILTON_N10	UNIV	25-24-FDOT	12.00	101.591	103.000	0.0006	114	12.00	5.718	12.00	5.718
HILTON_N20	UNIV	25-24-FDOT	12.01	101.586	103.000	0.0002	13599	6.89	2.083	12.01	0.263
HILTON_N30	UNIV	25-24-FDOT	13.18	101.268	103.000	0.0001	10532	12.00	5.407	13.15	3.575
HILTON_SN10	UNIV	25-24-FDOT	12.00	105.493	106.500	0.0002	113	12.00	1.539	12.00	1.539
HILTON_SN20	UNIV	25-24-FDOT	12.01	105.493	106.500	0.0001	5001	6.24	0.521	0.00	0.000
HILTON_SN30	UNIV	25-24-FDOT	12.00	103.457	106.500	0.0001	113	12.00	1.530	12.00	1.530
IOA	UNIV	25-24-FDOT	21.33	103.780	105.000	0.0002	4559	12.00	84.250	12.00	82.977
MOTEL6_POND1	UNIV	25-24-FDOT	12.00	103.130	104.000	0.0002	5596	12.00	3.130	12.00	3.127
MOTEL6_POND2	UNIV	25-24-FDOT	13.42	102.462	104.000	0.0001	13863	12.00	3.127	13.42	1.911
NODE-D3	UNIV	25-24-FDOT	22.25	103.979	108.000	0.0016	608	39.17	39.326	39.17	39.352
NODE-D4	UNIV	25-24-FDOT	21.07	103.541	104.230	0.0001	4507	38.41	52.487	38.39	52.682
NODE-D6	UNIV	25-24-FDOT	21.15	103.316	104.100	0.0002	4451	11.33	28.814	11.38	27.444
NODE-F	UNIV	25-24-FDOT	22.38	104.164	108.000	0.0026	489	28.19	24.251	28.20	24.267
NODE-G1	UNIV	25-24-FDOT	21.17	111.878	116.510	-0.0123	3244	12.00	32.184	11.47	64.967
NODE-G2	UNIV	25-24-FDOT	21.13	111.885	125.580	-0.0025	552	12.00	34.747	12.00	34.589
NODE-H1	UNIV	25-24-FDOT	22.26	103.978	105.000	-0.0005	4461	11.44	21.066	44.77	21.534
OVERFLOW	UNIV	25-24-FDOT	21.15	103.316	103.000	0.0002	4484	24.58	39.294	24.55	39.572
POND-A	UNIV	25-24-FDOT	21.34	102.803	105.000	0.0001	164955	12.00	63.100	12.28	29.450
POND-B	UNIV	25-24-FDOT	21.47	103.239	105.000	0.0001	263974	12.00	59.793	10.84	35.695
POND-C	UNIV	25-24-FDOT	21.96	102.663	105.000	0.0001	356599	12.00	91.719	24.61	42.008
POND-D	UNIV	25-24-FDOT	21.44	103.762	105.000	0.0001	488799	12.00	132.042	38.33	63.616
POND-D2	UNIV	25-24-FDOT	21.63	103.809	105.000	0.0001	61019	39.20	40.949	39.27	43.541
POND-D3	UNIV	25-24-FDOT	21.99	103.871	105.000	0.0001	39680	39.17	39.352	39.20	40.949
POND-E1	UNIV	25-24-FDOT	18.19	115.235	116.000	0.0000	32234	18.00	28.822	18.19	28.387
POND-E2	UNIV	25-24-FDOT	18.95	110.004	116.000	0.0003	40134	18.19	36.180	19.01	34.930
POND-F	UNIV	25-24-FDOT	24.05	104.674	108.000	0.0001	227322	12.00	36.567	28.98	26.430

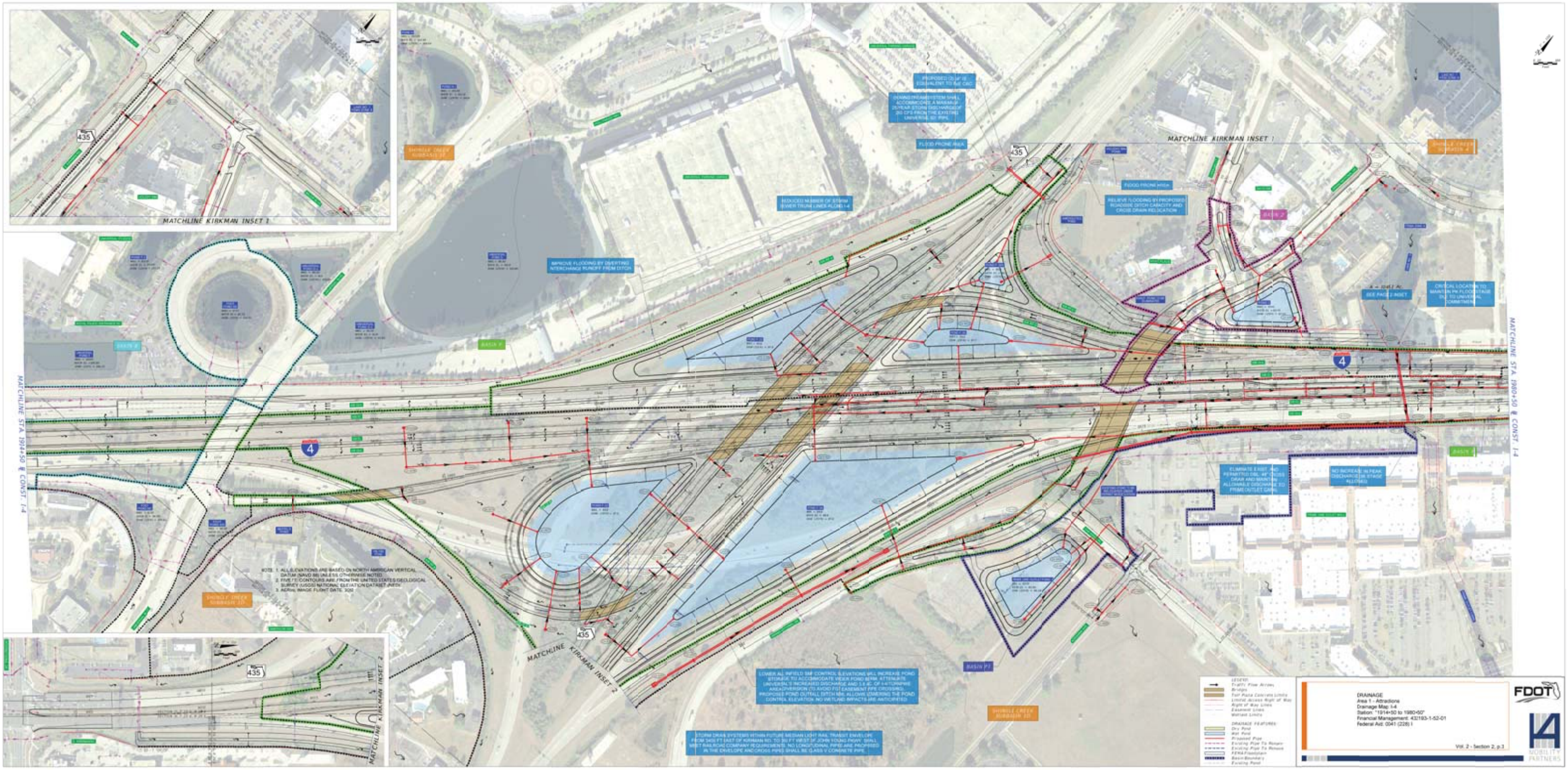
Name	Group	Simulation	Max Time Stage hrs	Max Stage ft	Warning Stage ft	Max Delta Stage ft	Max Surf Area ft2	Max Time Inflow hrs	Max Inflow cfs	Max Time Outflow hrs	Max Outflow cfs
POND-F1	UNIV	25-24-FDOT	21.18	111.876	113.000	0.0002	256926	11.47	118.774	21.12	23.618
POND-F2	UNIV	25-24-FDOT	19.15	105.123	108.000	0.0001	50465	12.00	7.560	16.42	2.984
POND-H	UNIV	25-24-FDOT	23.19	103.957	105.000	0.0000	1067245	12.00	67.053	25.33	44.071
POND-H1	UNIV	25-24-FDOT	22.23	104.008	105.000	0.0001	62760	12.00	9.276	12.39	6.488
POND-I	UNIV	25-24-FDOT	21.09	106.065	106.000	0.0000	425189	12.00	44.607	21.06	34.725
SPG	UNIV	25-24-FDOT	21.05	103.351	106.720	0.0001	4455	38.39	52.682	38.35	52.876
SUPER8_POND	UNIV	25-24-FDOT	12.00	100.848	103.000	0.0001	7272	12.00	3.347	12.00	3.341
US15	UNIV	25-24-FDOT	12.35	104.273	106.000	0.0001	22574	12.00	12.798	12.35	12.374
US16	UNIV	25-24-FDOT	12.12	98.200	102.500	0.0001	9835	12.00	29.706	12.01	28.936
US18	UNIV	25-24-FDOT	17.14	100.701	105.000	0.0001	47322	12.28	5.453	17.14	2.111
US20	UNIV	25-24-FDOT	12.59	97.589	105.000	0.0002	46693	12.19	72.724	12.51	70.384
US21	UNIV	25-24-FDOT	11.75	97.441	102.000	0.0001	4423	12.00	8.759	12.00	8.808
US22	UNIV	25-24-FDOT	19.90	99.942	102.000	0.0001	46599	12.25	9.915	12.90	5.180
US23	UNIV	25-24-FDOT	20.11	99.867	105.000	0.0001	10900	12.00	4.317	12.00	2.707
US26	UNIV	25-24-FDOT	21.94	99.006	102.000	0.0001	142859	12.00	10.876	10.24	4.586
US27	UNIV	25-24-FDOT	12.38	99.131	103.000	0.0001	30677	12.00	4.641	12.38	3.489
US29	UNIV	25-24-FDOT	13.35	97.984	103.000	0.0001	59572	12.00	5.982	13.28	4.183
US30-32	UNIV	25-24-FDOT	21.15	99.731	105.000	0.0001	40095	21.02	156.613	21.24	156.521
US31	UNIV	25-24-FDOT	22.05	98.983	100.000	0.0002	225141	9.15	13.431	26.29	5.950
US33	UNIV	25-24-FDOT	12.44	99.448	105.000	0.0001	71672	12.00	10.975	12.43	8.908
US34	UNIV	25-24-FDOT	12.46	99.183	105.000	0.0006	4359	12.43	8.908	12.46	8.906
US35-36	UNIV	25-24-FDOT	16.94	96.519	105.000	0.0001	19589	19.49	159.317	21.14	159.517
WEIR-E2	UNIV	25-24-FDOT	18.49	108.893	120.000	0.0007	4371	19.01	34.930	18.49	35.870
WEIR-I	UNIV	25-24-FDOT	21.10	105.911	106.000	0.0000	4365	21.06	34.725	21.09	34.722
200	UNIV	25-72-SF	60.80	112.294	113.500	0.0008	48443	60.17	50.910	60.80	12.792
200-OUT	UNIV	25-72-SF	60.90	107.977	115.000	0.0002	9847	60.80	12.792	60.90	12.744
300	UNIV	25-72-SF	61.60	100.458	102.000	0.0006	34282	60.13	31.445	60.24	10.119
400	UNIV	25-72-SF	61.56	100.449	103.000	0.0005	41471	60.00	22.667	62.82	4.092
500	UNIV	25-72-SF	61.19	103.549	105.000	0.0007	84243	60.00	78.070	60.70	9.668
AW_HOTEL	UNIV	25-72-SF	60.00	103.553	104.000	0.0002	7144	60.00	10.746	60.00	10.677
D260	UNIV	25-72-SF	60.00	136.668	141.000	-0.0015	1168	60.00	40.308	60.00	40.231
DCS-1	UNIV	25-72-SF	61.87	102.999	104.000	0.0010	4362	60.46	56.938	60.58	54.855
DCS-2	UNIV	25-72-SF	64.00	101.508	111.500	0.0012	4535	60.00	57.769	60.09	51.651
DCS-3	UNIV	25-72-SF	60.04	104.699	107.890	0.0024	4439	59.83	129.459	60.01	118.995
DCS-3A	UNIV	25-72-SF	62.54	103.257	106.000	0.0008	4364	60.46	13.340	69.64	12.362
DCS-7	UNIV	25-72-SF	62.80	100.389	104.000	0.0006	21800	60.04	173.564	60.07	157.054
DMH-33	UNIV	25-72-SF	62.61	101.126	104.000	0.0010	4376	60.01	125.914	60.03	122.214
DOT-1	UNIV	25-72-SF	62.37	98.014	100.200	0.0011	4451	60.33	9.765	60.35	9.046
DOT-2	UNIV	25-72-SF	62.39	98.012	101.000	0.0011	4812	60.35	10.355	60.37	9.742
DOT-3	UNIV	25-72-SF	62.39	98.011	101.000	0.0011	4732	60.36	10.964	60.37	10.362
DPHS	UNIV	25-72-SF	0.00	120.000	120.000	0.0000	0	0.00	0.000	18.00	26.000
DS15	UNIV	25-72-SF	60.23	105.050	105.000	0.0020	4929	59.99	56.241	60.23	43.673
DS17	UNIV	25-72-SF	60.81	100.120	103.000	0.0011	4498	60.07	79.306	60.08	75.769
DS18	UNIV	25-72-SF	60.86	99.929	102.000	0.0011	4475	60.08	78.352	60.11	74.056
DS18A	UNIV	25-72-SF	60.94	99.639	102.000	0.0009	61099	60.08	95.330	61.33	65.855
DS20	UNIV	25-72-SF	60.97	98.401	105.000	0.0006	19047	60.88	144.285	60.97	143.915
DS21	UNIV	25-72-SF	60.97	98.105	105.000	0.0006	40084	60.77	166.276	60.83	161.373
DS22	UNIV	25-72-SF	62.40	100.497	105.000	0.0006	11186	60.69	18.639	0.00	0.000
DS23	UNIV	25-72-SF	62.78	100.153	105.000	0.0006	40671	60.31	23.229	61.38	18.182
DS26	UNIV	25-72-SF	64.78	99.191	105.000	0.0003	37335	60.63	4.526	54.89	7.296
DS27	UNIV	25-72-SF	61.11	97.707	105.000	0.0005	68744	60.82	170.336	60.99	162.438
DS29	UNIV	25-72-SF	62.24	97.632	105.000	0.0004	42636	60.33	179.858	60.42	168.298

Name	Group	Simulation	Max Time Stage hrs	Max Stage ft	Warning Stage ft	Max Delta Stage ft	Max Surf Area ft2	Max Time Inflow hrs	Max Inflow cfs	Max Time Outflow hrs	Max Outflow cfs
DS30-32	UNIV	25-72-SF	62.37	98.015	105.000	0.0003	26712	60.25	160.334	64.41	160.454
DS31	UNIV	25-72-SF	63.49	99.159	105.000	0.0004	4389	66.60	73.819	66.56	73.919
DS34	UNIV	25-72-SF	61.42	96.828	105.000	0.0005	48147	60.97	181.337	61.15	175.820
DS35-36	UNIV	25-72-SF	61.45	96.782	98.000	0.0005	31128	61.20	208.529	61.27	207.293
HILTON_N10	UNIV	25-72-SF	60.02	103.080	103.000	-0.0159	11488	60.00	31.795	59.92	31.416
HILTON_N20	UNIV	25-72-SF	60.30	102.098	103.000	0.0002	14937	60.01	4.856	60.24	0.285
HILTON_N30	UNIV	25-72-SF	60.08	102.292	103.000	0.0016	12461	59.84	27.069	60.08	21.237
HILTON_SN10	UNIV	25-72-SF	60.00	105.986	106.500	-0.0004	113	60.00	8.577	60.00	8.573
HILTON_SN20	UNIV	25-72-SF	60.18	105.660	106.500	0.0001	5198	59.83	0.571	0.00	0.000
HILTON_SN30	UNIV	25-72-SF	60.03	104.975	106.500	-0.0032	4434	60.00	8.037	60.03	7.267
IOA	UNIV	25-72-SF	60.27	106.861	105.000	0.0030	4559	60.17	352.402	60.20	340.547
MOTEL6_POND1	UNIV	25-72-SF	60.00	103.418	104.000	0.0002	6123	60.00	17.479	60.00	17.415
MOTEL6_POND2	UNIV	25-72-SF	60.62	103.286	104.000	0.0009	15551	60.00	17.415	60.54	2.882
NODE-D3	UNIV	25-72-SF	64.10	104.221	108.000	0.0016	608	59.95	39.465	59.95	38.958
NODE-D4	UNIV	25-72-SF	60.04	104.548	104.230	0.0024	4507	83.42	54.334	83.40	54.551
NODE-D6	UNIV	25-72-SF	60.05	105.533	104.100	0.0030	4451	60.00	62.175	60.12	56.743
NODE-F	UNIV	25-72-SF	64.30	104.421	108.000	0.0033	489	70.38	25.486	70.37	25.500
NODE-G1	UNIV	25-72-SF	61.15	112.390	116.510	-0.0123	3229	60.00	179.312	60.00	171.970
NODE-G2	UNIV	25-72-SF	60.00	114.003	125.580	-0.0035	552	60.00	190.325	60.00	188.870
NODE-H1	UNIV	25-72-SF	64.14	104.198	105.000	0.0007	4461	60.00	28.621	60.07	24.943
OVERFLOW	UNIV	25-72-SF	60.04	104.637	103.000	0.0023	4484	59.78	39.348	68.43	38.213
POND-A	UNIV	25-72-SF	61.05	103.425	105.000	0.0012	171287	60.17	285.866	60.46	56.938
POND-B	UNIV	25-72-SF	61.08	103.624	105.000	0.0009	263974	60.00	324.977	60.85	37.022
POND-C	UNIV	25-72-SF	64.43	102.876	105.000	0.0007	359286	60.13	258.092	69.93	41.452
POND-D	UNIV	25-72-SF	62.36	104.144	105.000	0.0010	506556	60.17	476.591	83.33	65.516
POND-D2	UNIV	25-72-SF	62.55	104.154	105.000	0.0007	61019	84.57	40.372	84.58	43.199
POND-D3	UNIV	25-72-SF	62.82	104.172	105.000	0.0007	39680	59.96	51.083	84.57	40.372
POND-E1	UNIV	25-72-SF	60.12	115.234	116.000	0.0004	32234	60.00	37.368	60.12	28.343
POND-E2	UNIV	25-72-SF	60.39	111.649	116.000	0.0015	137012	60.00	128.792	60.33	49.380
POND-F	UNIV	25-72-SF	66.19	104.954	108.000	0.0004	230372	60.00	127.255	70.51	27.702
POND-F1	UNIV	25-72-SF	61.18	112.381	113.000	0.0014	260480	60.00	469.987	61.17	48.231
POND-F2	UNIV	25-72-SF	61.27	105.866	108.000	0.0006	55316	60.00	42.356	60.78	3.752
POND-H	UNIV	25-72-SF	66.50	103.959	105.000	0.0002	1067317	60.00	284.090	69.38	35.306
POND-H1	UNIV	25-72-SF	64.10	104.237	105.000	0.0005	63759	60.00	51.312	60.12	14.884
POND-I	UNIV	25-72-SF	62.33	105.756	106.000	0.0002	420877	60.00	123.407	62.28	28.083
SPG	UNIV	25-72-SF	60.04	104.798	106.720	0.0025	4455	83.40	54.551	83.36	54.767
SUPER8_POND	UNIV	25-72-SF	60.01	101.536	103.000	-0.0005	8105	60.00	18.706	60.01	18.201
US15	UNIV	25-72-SF	60.26	105.060	106.000	0.0007	34062	60.17	42.310	60.35	38.673
US16	UNIV	25-72-SF	60.14	101.151	102.500	0.0018	17335	60.00	95.941	60.13	82.803
US18	UNIV	25-72-SF	60.83	101.061	105.000	0.0008	54255	60.27	44.414	60.82	19.230
US20	UNIV	25-72-SF	60.93	99.598	105.000	0.0009	74998	60.50	167.576	60.88	144.285
US21	UNIV	25-72-SF	60.25	100.443	102.000	0.0021	99014	60.00	48.054	60.20	26.588
US22	UNIV	25-72-SF	62.23	100.716	102.000	0.0007	183027	60.50	37.846	61.56	7.061
US23	UNIV	25-72-SF	62.40	100.497	105.000	0.0006	11609	60.17	20.010	60.69	20.327
US26	UNIV	25-72-SF	65.05	99.202	102.000	0.0003	153683	60.17	48.935	60.63	4.526
US27	UNIV	25-72-SF	60.49	99.884	103.000	0.0005	45517	60.00	25.598	60.49	6.330
US29	UNIV	25-72-SF	60.94	98.459	103.000	0.0003	82406	60.17	25.551	60.96	8.021
US30-32	UNIV	25-72-SF	62.78	100.146	105.000	0.0006	42600	60.22	170.912	64.27	159.809
US31	UNIV	25-72-SF	64.78	99.191	100.000	0.0003	247534	60.17	38.566	73.35	6.834
US33	UNIV	25-72-SF	60.71	100.131	105.000	0.0003	152326	60.17	51.416	60.71	15.512
US34	UNIV	25-72-SF	60.74	99.327	105.000	0.0003	4359	60.71	15.512	60.74	15.511
US35-36	UNIV	25-72-SF	62.21	97.482	105.000	0.0005	22163	60.38	176.650	64.27	170.548

Name	Group	Simulation	Max Time Stage hrs	Max Stage ft	Warning Stage ft	Max Delta Stage ft	Max Surf Area ft2	Max Time Inflow hrs	Max Inflow cfs	Max Time Outflow hrs	Max Outflow cfs
WEIR-E2	UNIV	25-72-SF	60.46	109.415	120.000	0.0007	4371	60.33	49.380	60.42	49.298
WEIR-I	UNIV	25-72-SF	62.34	105.611	106.000	0.0002	4365	62.28	28.083	62.34	28.078

5.

APPENDIX



DRAINAGE
Area 1 - Attractions
Drainage Map: I-4
Station: "1914+50 to 1980+50"
Financial Management: 432193-1-52-01
Federal Aid: 0041 (228) I

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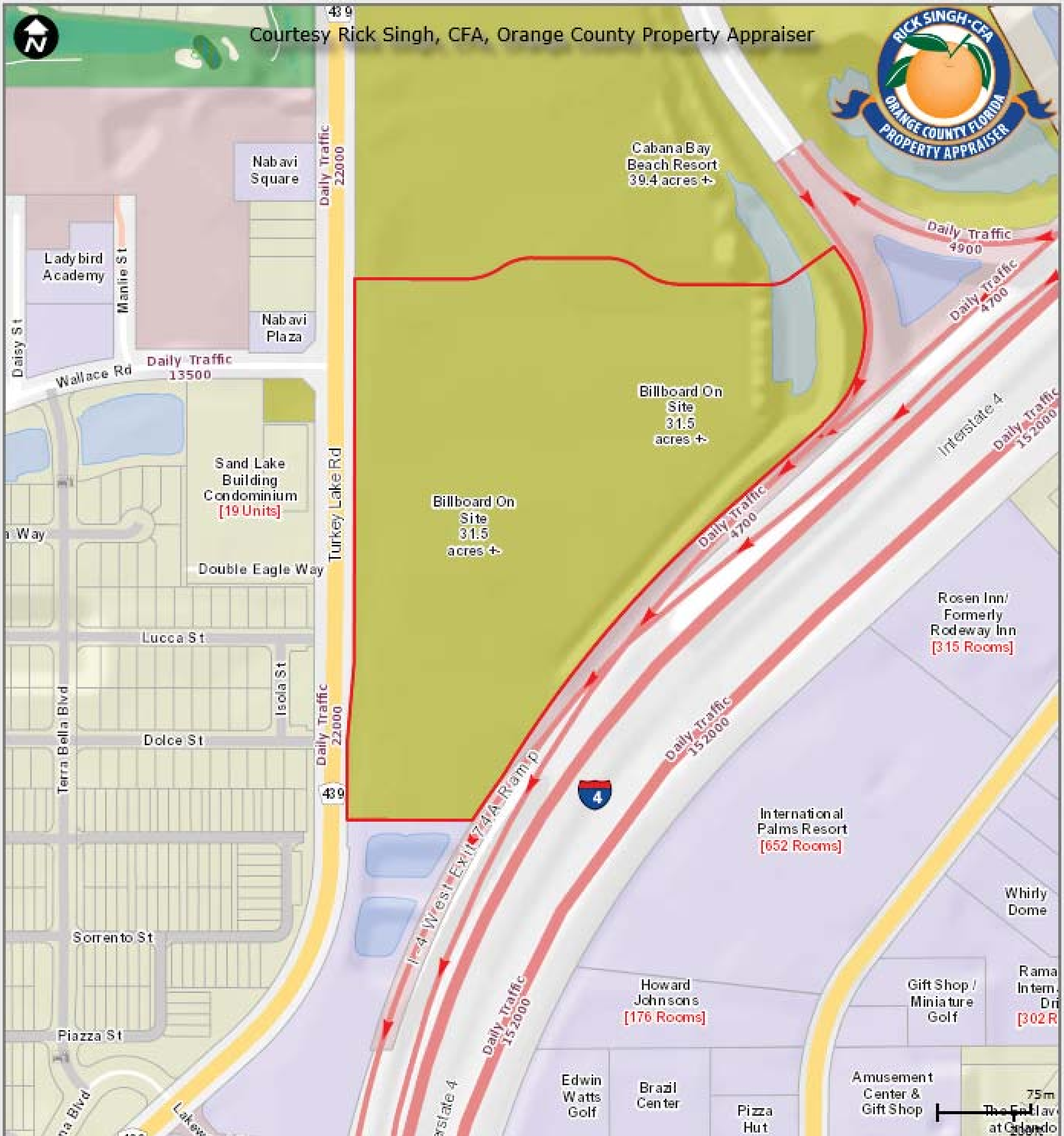
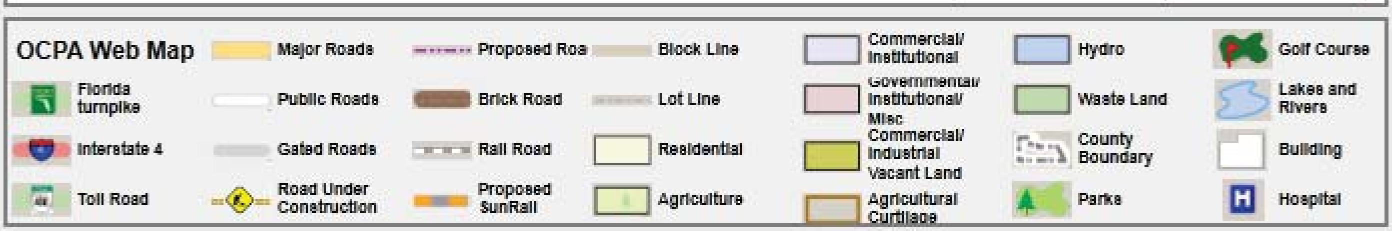
Parcel Report for 24-23-28-7500-00-010



Created: 9/16/2014

This map is for reference only and is not a survey.



282324750000010 11/18/2011

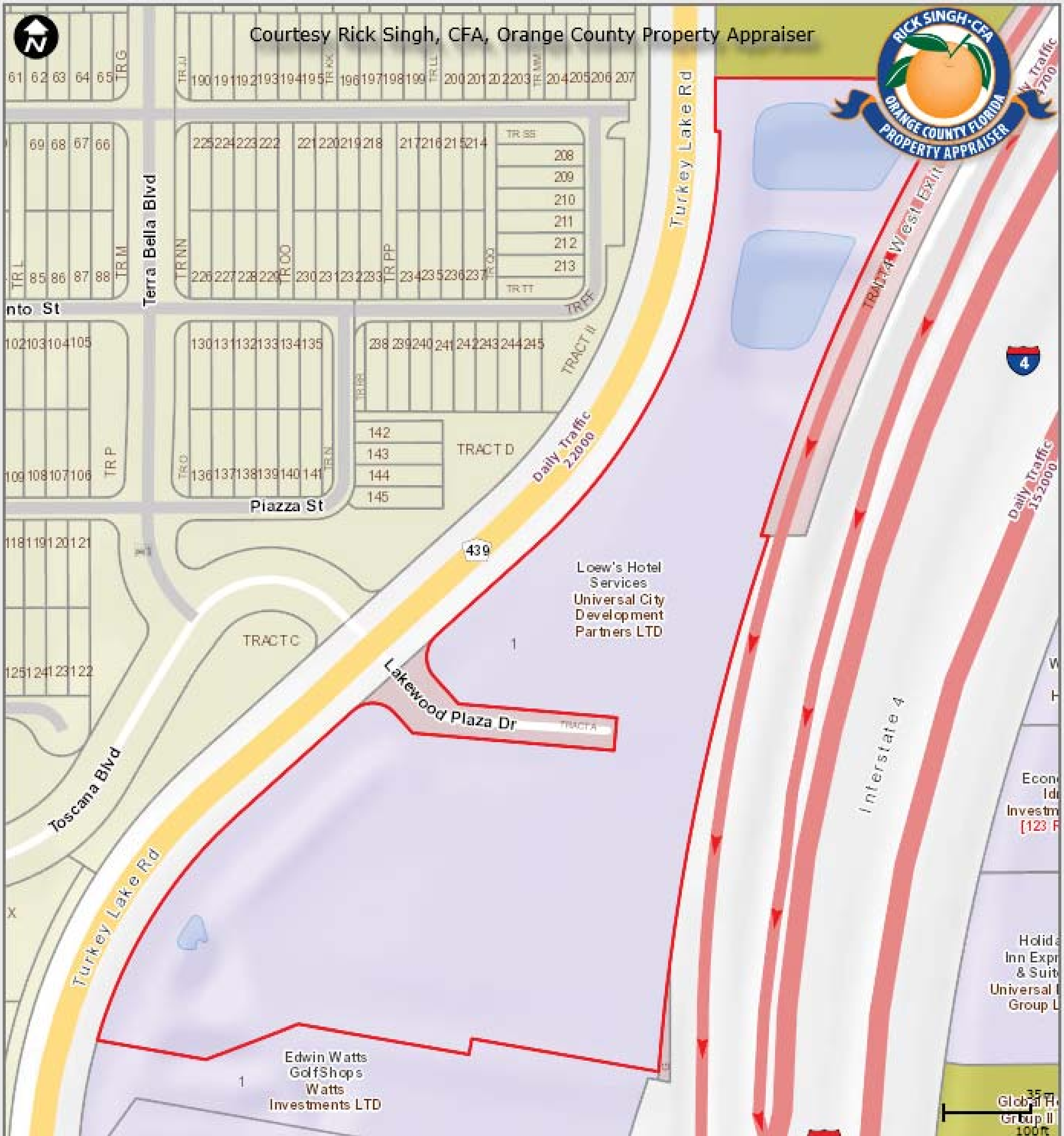
Info

PARCEL ID	24-23-28-7500-00-010	FEAT CODE	
STREET ADDRESS	6808 TURKEY LAKE RD	NC FLAG	0
NAME (1)	UNIVERSAL CITY DEVELOPMENT PARTNERS LTD	CONDO FLAG	0
MAILING ADDRESS	1000 UNIVERSAL STUDIOS PLZ	ST PLANE X-COORD	504318.13
CITY	ORLANDO	ST PLANE Y-COORD	1500906.4
STATE	FL	ACREAGE	31.53
ZIPCODE	32819	ACRE CODE	Generated
CITY CODE	ORL	LOT AREA (SQFT)	1373465.54
MILLAGE CODE	95	PARCEL	282324750000010
PROPERTY USE CODE	1000	PARENT ID	24-23-28-8981-00-030
NBHD CODE	900000012		

Values			
LAND (MKT) VALUE	$15,800,000	PREVIOUS YEAR ASSESSED VALUE	$9,500,000
BUILDING VALUE	$0	PREVIOUS YEAR MARKET (JUST)	$9,500,000
EXTRA FEATURE VALUE	$0	PREVIOUS YEAR TAXABLE VALUE	$9,500,000
MARKET (JUST) VALUE	$15,800,000	MARKET (JUST) VALUE CHANGE PCT	66.31%
ASSESSED VALUE	$15,800,000		

Land			
Land Line Order #	1	MKT Value	$13,335,000
Land ID	2766252	Unit Price	$500,000
Land Dorcode	1000	Unit Code	AC
Zoning	AC-3/MA	Land Qty	26.67
Land Line Order #	2	MKT Value	$1,815,000
Land ID	2823613	Unit Price	$500,000
Land Dorcode	1000	Unit Code	AC
Zoning	AC-3	Land Qty	3.63
Land Line Order #	3	MKT Value	$600,000
Land ID	3023821	Unit Price	$500,000
Land Dorcode	1000	Unit Code	AC
Zoning	AC-3/RP/MA	Land Qty	1.2
Land Line Order #	4	MKT Value	$50,000
Land ID	3023822	Unit Price	$50,000
Land Dorcode	9915	Unit Code	UT
Zoning	AC-3/MA	Land Qty	1

Parcel Report for 26-23-28-3190-00-010



Created: 9/16/2014

This map is for reference only and is not a survey.

OCPA Web Map

Major Roads	Proposed Roa	Block Line	Commercial/ Institutional	Hydro	Golf Course
Florida turnpike	Public Roads	Brick Road	Lot Line	Governmental/ Institutional/ Misc	Waste Land	Lakes and Rivers
Interstate 4	Gated Roads	Rail Road	Residential	Commercial/ Industrial Vacant Land	County Boundary	Building
Toll Road	Road Under Construction	Proposed SunRail	Agriculture	Agricultural Curtilage	Parks	Hospital

282326319000010 11/18/2011

Info

PARCEL ID	26-23-28-3190-00-010	FEAT CODE	
STREET ADDRESS	6800 LAKEWOOD PLAZA DR	NC FLAG	0
NAME (1)	UNIVERSAL CITY DEVELOPMENT PARTNERS LTD	CONDO FLAG	
MAILING ADDRESS	1000 UNIVERSAL STUDIOS PLZ	ST PLANE X-COORD	503362.55
CITY	ORLANDO	ST PLANE Y-COORD	1498771.98
STATE	FL	ACREAGE	12.271
ZIPCODE	32819	ACRE CODE	Generated
CITY CODE	ORL	LOT AREA (SQFT)	534562.93
MILLAGE CODE	95	PARCEL	282326319000010
PROPERTY USE CODE	1800	PARENT ID	26-23-28-8908-00-010
NBHD CODE	970000012		

Values

LAND (MKT) VALUE	$3,789,141	PREVIOUS YEAR ASSESSED VALUE	$10,987,529
BUILDING VALUE	$7,534,790	PREVIOUS YEAR MARKET (JUST)	$10,987,529
EXTRA FEATURE VALUE	$217,000	PREVIOUS YEAR TAXABLE VALUE	$10,987,529
MARKET (JUST) VALUE	$11,540,931	MARKET (JUST) VALUE CHANGE PCT	5.03%
ASSESSED VALUE	$11,540,931		

Land

Land Line Order #	1	MKT Value	$3,739,141
Land ID	2760231	Unit Price	$7
Land Dorcode	1800	Unit Code	SF
Zoning	AC-3	Land Qty	534162.93
Land Line Order #	2	MKT Value	$50,000
Land ID	2839991	Unit Price	$50,000
Land Dorcode	9915	Unit Code	UT
Zoning	AC-3	Land Qty	1

Building

Bldg #	1	Beds/Baths/Floors	0/0/2
AYB	1999	Living Area (SF)	22
EYB	1999	Exterior Wall	1
Type/Model Code	1800/03	Interior Wall	05
Bldg #	2	Beds/Baths/Floors	0/0/1
AYB	1999	Living Area (SF)	22
EYB	1999	Exterior Wall	2
Type/Model Code	4800/03	Interior Wall	01

Report
Geotechnical Engineering Services
NBC Universal Project 533
Universal Resort Orlando
Orange County, Florida
PSI Project No. 07571238

January 14, 2015

Universal Orlando
1000 Universal Studios Plaza
Orlando, Florida 32819

Attention: Mr. Frank E. Bianchi
Senior Project Manager Facility

RE: Report
Geotechnical Engineering Services
NBC Universal Project 533
Universal Resort Orlando
Orange County, Florida
PSI Project No. 07571238

Dear Mr. Bianchi:

In general accordance with our proposal to you dated October 30, 2014, Professional Service Industries, Inc. (PSI) has been providing geotechnical engineering services in connection with the noted project. Presented herein is an overview of the field work and laboratory testing completed to date together with recommendations for use in site preparation and foundation design.

PROJECT CONSIDERATIONS

The project is a proposed water theme park to be constructed to the south of the recently opened Cabana Beach Resort. The site is a vacant tract of land that occupies a plan area of some 25± acres. The site is generally triangular in shape, bounded by I-4 to the south, Turkey Lake Road to the west and the new hotel to the north. A generalized plan view of the area under consideration is included on **Figure 1**.

We understand that new construction will include slides and pools plus various recreational facilities. A tall "volcano" with slides will be constructed in the southern portion of the site. There will be a series of low-rise buildings constructed throughout the site with several containing equipment pits. The site is to be graded by cutting and filling, the full extent of which is not known to us at this time. We do however understand that some construction elements will be located several feet below the water table.

The largest below grade construction will be the bunker that is associated with the Volcano. The finished floor slab of the bunker is understood to be elevation +117 feet, some 20± feet below existing grade. Pool shells will also be located below grade with the deepest such feature being at the wave pool next to the Volcano equipment bunker.

Foundation loads for the most part are expected to be relatively light for most buildings and slides. (Assumed to be on the order of 100 to 200 kips for isolated column pads with strip footings carrying in the range 3 to 6 kips per linear foot). The volcano, which will be built with a steel framework, will be more heavily loaded with the structure carrying between 600 and 1,000 kips. This structure is also likely to be subjected to very high uplift loads. Some of the below ground structures may need to be designed to resist permanent unbalanced hydrostatic pressures, with anchor piles possibly being needed for such purposes.

Associated with the project will be at-grade pavement areas to include service/access roads and surface parking. Buried utilities will be constructed/provided to support the new project. A retaining wall will be built along a portion of the property line next to the I-4 on ramp. This wall will be up to 8 feet high.

SITE CONDITIONS

As noted earlier, the site is located at the south end of Universal Resort, to the south of the recently opened Cabana Beach Resort. The property occupies a plan area of some 25± acres, being bounded by Turkey Lake Road to the west and the I-4 ramp to the south/east. The ground cover consists of exposed sands with grass/weeds with areas in the northwest that were formerly used for construction trailer parking and staging/storage of materials and equipment for earlier construction projects. There are a few berms located around the perimeter of the project site (Turkey Lake Road side of the property and the I-4 ramp areas).

There is an existing wet bottom stormwater retention pond at the south end of the site. This pond is to be reclaimed as part of the new project.

Ground surface elevations across the site generally range from +140 feet in the west to +120 feet in the east, gently sloping to the low in the northeast corner of the site. In the eastern portion of the site, shallow excavation work was carried out in the past to obtain fill for a theme park project. This area is presently being refilled with material being obtained from a hotel/resort site to the east.

A review of the USDA Soil Survey for Orange County as contained on the internet indicates the vast majority of the site to be mantled by surficial Soil Group 20 (Immokalee fine sand). The typical profile for this soil group is 80 inches of clean to slightly silty fine sands (i.e. SP and SP/SM materials). The normal wet season high groundwater table is reported as being within one foot of the natural ground surface. (This estimate is for sites that do not have any drainage improvements).

SUBSURFACE CONDITIONS

General

Subsurface conditions at the site were evaluated by drilling/sampling a series of borings. The borings were drilled using a combination of Standard Penetration Test (SPT) procedures and auger techniques. A total of 56 borings will ultimately be drilled for the study (5 borings are yet to be completed). Of the total to be drilled, 26 will be completed following SPT procedures and 30 with auger techniques. The SPT borings were advanced to depths of between 25 and 100 feet below existing grade with the auger boring depths ranging from 10 to 20 feet.

The SPT borings were carried out in general accordance with the procedures outlined in ASTM D-1586. For most of the SPT borings, an automatic hammer was used to drive the sample spoon. A few borings were however completed using a safety hammer.

The approximate location at which the borings were drilled are shown on **Sheet 1**. Coordinate and ground surface elevation information for the borings was determined by Tinklepaugh Surveying Services. This information is included on **Table 1**.

Samples recovered from the borings were returned to our Orlando laboratory for visual stratification and select testing. Subsoils were visually stratified following the guidelines contained in the Unified Soil Classification System (USCS). Records of the materials encountered in the borings are presented as soil profiles on **Sheets 2** through **10**. These sheets include a legend describing the subsoils in USCS format. These sheets also note which SPT borings used an automatic hammer and which used a safety hammer.

Select samples were tested to determine natural moisture content and percent fines passing the U.S. Standard No. 200 sieve. A few Atterberg limits tests were also completed on some of the more clayey materials. The various laboratory tests were carried out following appropriate ASTM procedures. The results of the tests are included with the soil profiles on **Sheets 2** through **10** adjacent to the depth increment of the test specimen.

As part of the field program, six standpipe piezometers were installed at the site. The piezometers were constructed of 2-inch diameter schedule 40 pvc pipe with the lower 10 feet slotted and surrounded by filter sand. Since installation, the piezometers have been read on six occasions (refer to Table 2A).

Stratigraphy

The borings have disclosed reasonably consistent subsoil conditions across the site. For the purpose of discussion, these conditions have been generalized as follows.

In the depth interval drilled, 10 to 100 feet below existing grade, subsoils for the most part comprise a varying sequence of fine sands. These sands grade clean to slightly silty and silty/clayey in composition (SP, SP/SM, SM and SC materials). Interbedded within the sands are discontinuous layers of clay (sandy clay to clay). Where present, these clay layers are typically on the order of 5 to 15 feet thick.

Based on SPT blow counts, the sands are in a loose to medium dense condition with localized zones that grade dense to very dense. There are hardpan zones in the upper soil column where the sands grade weakly/partially cemented. These materials are typically present at depths on the order of 5 to 15 feet below grade and with the layer on the order of 5 to 10 feet thick. The clay layers were generally observed to be in a medium stiff to stiff condition with zones that are locally very stiff.

In the deeper borings, we encountered green gray silty/clayey sands of the Hawthorn formation. These materials are regionally continuous and act as an aquiclude over the limestone formation (Floridan Aquifer). Based on our experience at Universal Resorts, limestone is expected to be encountered at depths in excess of 150 feet below grade at this particular site (approximate elevation -50 feet+/-).

Groundwater

Groundwater level measurements were made in the borings at the time of drilling. These measurements disclosed the water table at depths in the range 3 to 8 feet below existing grade. In the eastern portion of the project, some standing water was noted during our engineering work. Based on the survey information provided to us, the measured water table depths were at elevations in the range +115.1 to +137.6 feet. The water table contours generally follow those of the ground surface, being higher in the west than in the east.

As part of our work on the project, we installed six standpipe piezometers across the site. The piezometers were installed at the approximate locations shown on **Sheet 1**. During the course of our work on the project, the piezometers were read on six occasions. The results of the piezometer readings are included on **Table 2**. During the field program, there has been about two feet of fluctuation in the water level readings in the piezometers. As noted earlier, there are some areas of standing water in the east.

Water levels will fluctuate seasonally in response to rainfall or lack thereof. Based on our experience at the site, we estimate that the normal wet season high water table will be at depths in the range 0 to 4 feet below existing grade. The water level will be shallowest in the low-lying areas in the east and deepest in the west.

We have used the measured levels to generate a contour map of the water table across the property. This map is reproduced herein on **Sheet 11**. On **Sheet 12** is a map of the estimated wet season high groundwater table. This map is based on no permanent dewatering systems being in place. We compared this map to a property wide contour map that we produced in 1994 for the estimated normal seasonal high water table and there was reasonably good correlation.

We recommend that these maps be the basis for design of the various facilities with respect to water table conditions. PSI should however be afforded the opportunity to review critical areas with respect to design water levels as work on this project continues.

SITE SUITABILITY

Based on the results of the borings, subsoil and groundwater conditions at the site are considered suitable for development from a geotechnical engineering perspective. For the most part, we consider that it will be possible to support the various buildings and slide foundations on shallow spread footings. Such foundations should be based in either densified native sands or compacted engineered fill. A design bearing value of 3,000 pounds per square foot (psf) can be used to size the building/slide foundations.

Some of the construction may be subjected to relatively heavy uplift forces, either due to wind forces or unbalanced hydrostatic pressures. If these forces cannot be safely resisted by dead weight alone, then some form of anchor pile will be needed. We suggest that properly reinforced augercast piles be used for this purpose.

Below ground construction should be waterproofed as necessary plus be designed to resist earth pressures as well as unbalanced hydrostatic pressures. At a minimum, we recommend that all pool shells be provided with an underdrain system to allow for lowering the water table below such facilities prior to emptying them for maintenance. At some locations, it may be necessary to provide a permanent dewatering system to control water levels and protect the in-place construction.

Conventional site preparation and construction should be carried out for the pavement and hardscape areas of the project. For the retaining wall along the property line adjacent to the I-4 ramps, a cantilever steel sheet pile wall is considered appropriate to limit impacts to utilities in the area.

More detailed discussions related to site preparation and foundation design matters for the project follow.

SITE PREPARATION RECOMMENDATIONS

Clearing

At the outset of construction, the site should be cleared of existing unwanted ground cover, organic topsoil materials and basecourse in former staging/storage areas. The stripping/clearing work should extend at least 10 feet beyond the outside edges of planned buildings, slides, pools and pavements wherever practical. The root systems of trees and major scrub should be removed in their entirety. As part of the initial clearing/preparation activities, any conflicting buried utilities should be removed with the resulting excavations being infilled with compacted engineered fill.

The initial site clearing work and site preparation activities should be carried out under the observation of a representative of this office, to confirm the adequacy of the work.

Subgrade Proof Rolling and Filling

After performing the clearing operations detailed herein, the development areas should be proof rolled. This should be accomplished using a large self-propelled vibratory compactor (e.g., Dynapac CA-25). Proof rolling should be carried out by making repeated overlapping coverages of the subgrade, to attain a degree of densification of at least 95 percent of the material's ASTM D-1557 modified Proctor maximum dry density to a depth of at least one foot.

If unsuitable/yielding soils are observed during proof rolling operations, such materials should be removed in their entirety and be replaced with clean granular fill (engineered fill) that is thoroughly and uniformly compacted.

Subgrade proof rolling operations should be carried out under engineering surveillance of a representative from this office with a program of field density control in effect. One of the main focuses of the on-site proof rolling observations will be to ascertain if there are any pockets of unsuitable materials in the building, pool and pavement areas that will require removal/replacement.

Next, engineered fill should be placed in 12-inch maximum lifts as measured in loose thickness. Each lift should be uniformly compacted to at least 95 percent of the material's ASTM D-1557 modified Proctor maximum dry density, prior to placement of subsequent lifts. The fill should be placed at a moisture content within 2 percent of optimum required to attain maximum dry density. Subsequent lifts should be placed and compacted in a similar manner until achieving proposed finished grades.

Engineered fill material should consist of clean sand that is free of organic matter and other deleterious substances. It should ideally have a fines content that does not exceed 12 percent (i.e. less than 12 percent by dry weight passing the U.S. Number 200 sieve). The source and suitability of proposed off site fill should be confirmed by PSI prior to bringing the material on site.

All earthwork operations should be carried out in accordance with current OSHA criteria and regulations.

Pond Infilling

The existing wet bottom pond at the south end of the site is to be reclaimed for the support of a building and at-grade pavement. This work should be carried out in the dry so as to facilitate the compaction of the backfill. Following the initial removal of the free water, the pond should be cleared of the side slope vegetation and any soft bottom sediments. These materials should be properly disposed of off-site. Additionally, any buried utilities in the pond area should be removed after initial dewatering.

Next, 2 to 3 feet of sand fill should be placed in the pond bottom. This fill should consist of a clean well-draining "orange grove" sand (less than 5 percent fines passing the U.S. Standard No. 200 sieve). The material should be placed to a stable and unyielding condition. Subsequent fill should meet the criteria noted in this report for engineered fill and be placed in uniform one foot thick lifts. Each lift should be compacted to at least 95 percent of the material's ASTM D-1557 maximum dry density. Fill placement and compaction should continue in this manner until reaching proposed finished grade.

Groundwater Control

Groundwater control will be required to allow for construction of the equipment pits and pool shells in the dry. Additionally, dewatering will be required for the installation of utilities. Based on the prevailing subsoil conditions, dewatering can be accomplished with either sump pumps, sock drains or wellpoints. The selection of system will depend on the depth of drawdown and the duration of the required dewatering. Dewatering systems should be designed and operated in accordance with regulatory criteria.

To dewater the volcano bunker, it may be necessary to use deep wells with individual pumps to achieve the necessary groundwater control for construction of this facility. Per your request, PSI will provide input into the design of the dewatering system for the bunker for inclusion on the project drawings and in the specifications.

At this time, it is not known if any permanent groundwater control will be needed to protect the various construction elements of the project. Should a permanent system(s) be required, we can provide input into the same as design on the project proceeds.

SHALLOW FOUNDATION CONSIDERATIONS

General

Provided the previously described clearing, grading and subgrade preparation recommendations are properly performed, the results of the exploration and analysis indicate that the proposed structures and slides of the water park can be supported by shallow spread footings. The foundations should bear in densified native sands and/or compacted engineered fill.

For design, the footings can be sized using a net allowable bearing pressure of 3,000 psf for both column (square type) and wall (strip type) footings. In order to avoid "punching type" shear failures, the wall and column footings should be at least 18 and 36 inches in width, respectively. Conventional spread footings should be embedded a minimum of 18 inches below adjacent compacted grade.

The bearing value is a net allowable pressure and the weight of the foundation concrete and the soil above can be ignored in size computations. For load combinations that include wind, the bearing value can be increased by one-third. Additionally, for eccentrically loaded foundations (e.g. retaining walls), a point/edge load of 4,000 psf would be acceptable provided that the uniform load across the full width of the foundation is 3,000 psf or less.

Alternate foundation systems to conventional column pad and strip footings that may be used on the project include monolithic thickened edge slabs and post-tensioned slabs. If such systems are used for the project, they should be designed and constructed in accordance with appropriate Building Codes and Standards. Mat foundation systems may also be used for equipment pits and any heavily loaded areas.

Resistance to lateral loads may be provided by earth pressure mobilized on the buried vertical faces of the footings and by shearing forces acting along the footing subgrade interface. Earth pressure resistance may be determined using an equivalent fluid density of 180 pcf for moist soil and 90 pcf for submerged soil below the water table. A friction factor of 0.4 should be used to determine base shearing resistance. An appropriate factor of safety should be used in the lateral design.

Based on our understanding of foundation loads, we expect settlements to be within tolerable structural limits (i.e. total settlements not exceeding one inch with differential settlements of one half inch or less). Given the generally granular nature of the subsoils, foundation settlements will occur relatively quickly after initial load application, with the majority of the movement taking place during the construction period.

At this time, the foundation loads for the volcano and its equipment bunker are unknown to us. Once these loads are better defined, we request the opportunity to review potential settlement movements for this particular structure. At this time, with the range of loads provided (up to 1,000 kips), total settlements may exceed one inch.

Slab on grade construction can be used for the ground floor of the buildings. The slabs should be supported on compacted sand fill and/or densified native sands. An impermeable membrane should be provided below slabs to reduce potential moisture problems with the various floor coverings likely to be used on the project. To avoid potential problems with cracking because of differential loadings, the floor slabs should be liberally jointed and separated from columns and walls.

Foundation Excavations

Based on the results of the borings, the soils at the site can be excavated with normal excavation equipment. Where required, slope protection should be provided in accordance with the most recent OSHA regulations.

All foundation excavations should be observed by a representative of PSI to explore the extent of any fill and excessively loose, soft, or otherwise undesirable materials. If the foundation bearing soils are observed to be suitable as load bearing materials, the soils should be prepared for construction by compacting to a density of at least 95 percent of the material's modified Proctor maximum dry density (ASTM D-1557). The required compaction should be achieved for a depth of at least two feet below the bottom of the footing base.

If soft pockets of soil are encountered in the footing excavations, then such unsuitable materials should be excavated and backfilled with suitable granular fill. This backfilling may be done with a well-compacted, suitable fill such as clean sand, gravel, or crushed No. 57 or No. 67 stone or with very lean concrete. Sand backfill should be compacted to a density of at least 95 percent of the material's modified Proctor maximum dry density (ASTM D-1557), as previously described. Gravel/stone should be compacted to a firm/unyielding condition.

Immediately prior to placement of foundation reinforcing steel, it is suggested that the bearing surfaces of all footing and floor slab areas be compacted using hand operated mechanical tampers. In this manner, any localized areas, which have been loosened by excavation operations, can be adequately re-compacted.

Soils exposed in the bases of all foundation excavations should be protected against any detrimental change in conditions such as from physical disturbance or rain. Surface water run-off should be directed away from the excavations and not be allowed to pond. If possible, all footing concrete should be placed the same day the excavation is made. If this is not possible, the footing excavations should be adequately protected.

PILE FOUNDATION CONSIDERATIONS

Piling may be required for support of heavy foundation loads and for possible uplift resistance to facilities subject to heavy wind forces or large unbalanced hydrostatic pressures. Subsoil conditions lend themselves to the use of augercast piles. For properly reinforced pressure grouted augercast piles (nominal 16-inch diameter) allowable design capacities as provided below should be attainable.

Compression	–	50 tons
Tension	–	30 tons
Lateral	–	6 tons

The capacities are based on the piles being installed at least 40 feet into soil. Actual pile lengths should be confirmed through a program of load testing as discussed herein. Additionally, depending on the cut off elevation of the top of the pile, lengths may vary with the performance of deeper structure specific borings being required to evaluate lengths.

The lateral capacity assumes a fixed-head condition in the pile cap, with some nominal movement (one-quarter inch or so) being tolerable. Additional lateral resistance can be provided from the passive resistance developed on the edges of the pile cap. Piles should be installed at a minimum center to center spacing of 4 feet. At least 6 feet should be maintained between installing/constructing new piles adjacent to piles that are less than 24 hours old.

Augercast piles should be installed to predetermined design tip elevations established by means of a pile load test program. Additionally, the piles should be drilled in one continuous operation to the desired penetration depth. Grouting of augercast piles must similarly be carried out in a continuous operation without intermittent delays. Care should be exercised to provide an adequate supply of fresh grout to the auger tip at all times during casting. Monitoring of auger depth, grout volume/flow, and grout pressures is considered essential to ensure proper construction of augercast piles. All piles which encounter obstructions or delays during installation should be immediately redrilled.

Reinforcement cages may be installed from the ground surface by lowering through fresh grout. Cages should be adequately designed with helical or hoop steel and centralizers to properly locate it within the pile shaft. Single reinforcement bars or bundles should be installed to full depth however to provide uplift resistance. As a general means of checking pile integrity, we recommend that all augercast piles be provided with a full length reinforcing bar.

To confirm pile capacities, we suggest that a load test program be carried out. In addition to carrying out a static load test, we suggest that several indicator piles be installed throughout the area where piles are required. The purpose of the indicator piles would be to confirm that the piles can be constructed to the projected tip depths.

At one of the indicator pile locations, a static load test would be completed. The actual test pile should be a throwaway, preferably loaded to failure. Four production piles could be used as reaction for the test frame with these piles being monitored for tension movement. The compression load test should be conducted using the quick test procedures in accordance with ASTM D-1143.

Where the piles are required solely for uplift resistance, then a tension test should be completed to confirm capacity and performance. The tension test should be carried out in accordance with ASTM D-3689.

Based on our current understanding of loads as noted herein, we estimate that the total settlement of pile supported foundations will be on the order of one inch or less. Differential settlement movements are anticipated to be one-half inch or less. We estimate that the majority of the settlement movement will take place during the construction period as dead load is applied to the foundations.

Augercast piles should be installed by a contractor with demonstrated experience in this type of work. PSI will provide a representative on site to observe and record pile installation for the project. As design proceeds on the project, we can work with you and the Structural Engineer to optimize pile capacities if it is felt that such a design review could possibly provide a savings to the foundation systems of the project.

OTHER CONSIDERATIONS

Below Grade Construction

Several below ground equipment pits are to be built as part of the project. The largest of these pits will be the volcano bunker. Such structures should be designed to resist earth and hydrostatic pressures plus be waterproofed as appropriate.

Earth pressures should be based on at-rest conditions. Above the water table an equivalent fluid density of 55 pcf may be used for this purpose, while below the water table, an equivalent fluid density of 90 pcf should be used for design. The equivalent fluid densities are based on the structural backfill comprising sand. Below ground structures and pits should be designed to resist unbalanced hydrostatic uplift forces. The water table should be assumed at the existing ground surface for computation of the uplift pressures. If this is not possible/practical, then drainage measures should be provided so that the water does not rise above the design level.

The subgrade for the construction of the pits/below ground structures should be stable and unyielding prior to placing concrete. In order to accomplish this, dewatering will be required and possibly some overexcavation of very clayey/silty soils. Additionally, it may be necessary to use geotextile fabric and gravel to create a stable subgrade. Discharge from dewatering systems should be handled in accordance with current regulatory criteria. The dewatering system should not be decommissioned until sufficient deadweight exists on the structure to resist uplift forces.

For the larger pits, uplift due to unbalanced hydrostatic pressures may be a potential problem. To resist such forces, it may be necessary to use protruding edges on the structural foundations and have the submerged weight of the soil provide sufficient counterbalance or alternately anchor piles (tension augercast piles) could be used to provide resistance.

Earth Pressures on Walls

Retaining walls should be designed to resist pressures exerted by the adjacent soils and hydrostatic head. For walls that are not restrained during backfilling but are free to rotate at the top, active earth pressure should be used in design. Walls that are restrained should be designed assuming at-rest pressures. Recommended equivalent fluid densities for each pressure condition are presented below.

Active Pressure	At-Rest Pressure
Above water table - 35 pcf	Above water table - 55 pcf
Below water table - 80 pcf	Below water table - 90 pcf

The above recommended pressures assume that adequate drainage is provided behind the walls to prevent the buildup of excess hydrostatic pressures. This can be achieved by installing drains, using geotextiles or backfilling with free draining sand in association with adequate weep holes.

Retaining wall design needs to consider loads from sloping backfill and construction surcharge loads (temporary and permanent) as appropriate. For the retaining wall that is planned along the property line at the I-4 ramps, we would suggest a cantilever steel sheet pile be utilized.

Pavement Areas

Pavements are to be constructed as part of the project. These pavement areas will include interior service roads and parking lots. Provided that a minimum separation of 2 feet is maintained between the bottom of the base course and the normal seasonal high groundwater table, pavement base materials can comprise either limerock or soil cement. If this minimum separation cannot be met, then soil cement should be used with underdrains possibly being required.

For light and medium duty uses, recommended minimum pavement sections are as follows.

Light Duty

1.5 inches	Type S asphalt
6.0 inches	Limerock basecourse (LBR = 100) or soil cement (300 psi)
8.0 inches	Stabilized subgrade (LBR = 30) for a limerock base or a subgrade compacted to 98 percent of the material's ASMT D-1557 maximum dry density if soil cement is used.

Medium Duty

2.0 inches	Type S asphalt
8.0 inches	Limerock basecourse (LBR = 100) or soil cement (300 psi)
12.0 inches	Stabilized subgrade (LBR = 30) for a limerock base or a subgrade compacted to 98 percent of the material's ASMT D-1557 maximum dry density if soil cement is used.

Adequate drainage should be provided at the edges of the pavement to prevent potential problems due to migrating irrigation water. Heavily landscaped areas adjacent to pavements and hardscape/buildings should be provided with underdrains.

The pavements should be constructed in accordance with the City of Orlando specifications. The noted pavement sections should be considered minimums based on experience and should be confirmed by the Project Civil Engineer.

If specialty pavements are constructed for the project, it should be determined that the overall section has a Structural Number that meets the traffic needs, plus the base and subgrade should be designed/constructed in accordance with the suppliers/manufacturers requirements.

Pool Underdrain Systems

We recommend that the pool shells of the project including the shells of the lazy river and the rapids ride be provided with an underdrain system. The system should include a gravel blanket with perforated underdrain pipes that lead to sump pits equipped with pumps. The systems would only typically be used (pumped) during maintenance when the facilities are drained. Prior to emptying the pools, the underdrain system would be pumped to reduce unbalanced hydrostatic pressures on the pool shells to prevent them from "popping out" of the ground. The system would continue to be pumped until the pools are refilled with water.

We would suggest that the grades of the pool shells be established such that the underdrain systems are not required during normal daily operations of the facilities, but only for maintenance purposes as discussed earlier.

REPORT LIMITATIONS

Our professional services have been performed, our findings obtained, and our recommendations prepared in accordance with generally accepted geotechnical engineering principles and practices. This company is not responsible for the conclusions, opinions or recommendations made by others based on these data.

The scope of the investigation was intended to evaluate soil conditions within the influence of the proposed structure foundations and does not include a detailed evaluation of potential deep soil problems such as sinkholes. The analysis and recommendations submitted in this report are based upon the data obtained from the soil borings performed at the locations indicated. If any subsoil variations become evident during the course of this project, a re-evaluation of the recommendations contained in this report will be necessary after we have had an opportunity to observe the characteristics of the conditions encountered. The applicability of the report should also be reviewed in the event significant changes occur in the design, nature or location of the proposed structures.

The scope of our services did not include any environmental assessment or investigation for the presence or absence of hazardous or toxic materials in the soil, groundwater, or surface water within or beyond the site studied. Any statements in this report regarding odors, staining of soils, or other unusual conditions observed are strictly for the information of our client.

CLOSURE

We appreciate the opportunity to be of service on this project and we trust that the foregoing and accompanying attachments are of assistance to you and your consultants at this time. In the event that you have any questions or if you require additional information, please call.

Very truly yours,

PROFESSIONAL SERVICE INDUSTRIES, INC.
Certificate of Authorization No. 3684

Ian Kinnear, P.E.
Chief Geotechnical Engineer
Florida License No. 32614

Robert A. Trompke, P.E.
Principal Consultant/Department Manager
Florida License No. 55456

07571238 (NBC Universal Project 533)114

Attachments

- Tables 1 and 2
- Sheets 1 through 12

Table 1 - Summary of Boring Surveying Data			
NBC Universal Project 533			
Boring	Easting	Northing	Elevation
B-1	50109.44	46774.18	140.6
B-2	50209.4	46855.69	143.1
B-3	50205.69	46773.88	139.6
B-4	50109.97	46193.75	140.4
B-5	50172.14	46112.81	140.3
B-6	50374.05	46194.87	138.7
B-7	50611.84	46266.92	*137.2
B-8	50553.48	46309.69	135.3
B-9	50657.18	46318.06	134.4
B-10	50662.38	46217.05	134.2
B-11	50114.33	45923.43	*141.4
B-12	50112.42	45834.57	*141.5
B-13	50204.08	45912.41	*141.4
B-14	50388.66	45857.99	138.3
B-15	50453.26	45889.55	137.0
B-16	50522.95	45828.29	*136.5
B-17	50478.93	45718.62	137.7
B-18	50414.48	45588.8	142.2
B-19	50323.62	45534.57	140.6
B-20	50208.67	45535.23	141.2
B-21	50106.94	45528.23	141.7
B-22	50108.05	45658.46	*141.6
B-23	50220.08	45158.86	138.4
B-24	50417.56	45495.49	138.0
B-25	-	-	*133.0
B-26	50906.39	46136.81	129.2

*Elevation estimated from 7/11/14 topo data

Table 1 Continued - Summary of Boring Surveying Data			
NBC Universal Project 533			
Boring	**Easting**	**Northing**	**Elevation**
AB-1	50434.31	46842.83	142.2
AB-2	50584.06	46865.14	132.8
AB-3	50651.14	46725.92	131.9
AB-4	50830.88	46830.45	130.9
AB-5	50934.82	46763.15	127.0
AB-6	51311.94	46841.52	121.1
AB-7	51364.69	46740.79	128.2
AB-8	51203.51	46550.34	129.0
AB-9	51038.12	46568.41	125.9
AB-10	51133.8	46448.44	125.2
AB-11	50889.74	46306.64	130.0
AB-12	50716.04	46379.81	133.4
AB-13	50787.07	46449.32	132.3
AB-14	50824.79	46591.14	130.6
AB-15	50655.97	46531.56	132.4
AB-16	50366.12	46527.57	136.1
AB-17	50182.2	46605.12	139.3
AB-18	50168.46	46429.89	140.4
AB-19	50172.78	46330.41	140.4
AB-20	50370.79	46101.05	138.7
AB-21	50454.41	46064.74	137.0
AB-22	50726.36	46026.81	137.4
AB-23	-	-	131.7
AB-24	50305.12	45742.64	140.4
AB-25	50089.81	45411.47	141.0
AB-26	50234.66	45416.12	137.2
AB-27	50081.68	45300.29	139.8
AB-28	50236.66	45270.77	140.7
AB-29	50561.19	46211.11	135.4
AB-30	50168.58	46203.54	140.6

*Elevation estimated from 7/11/14 topo data

Table 2A - Summary of Piezometer Readings from Grade						
NBC Universal Project 533						
Date	P-1	P-2	P-3	P-4	P-5	P-6
12/5/2014	4.4'	0.7'	5.8'	5.7'	5.5'	4.5'
12/10/2014	3.0'	0.8'	No reading	5.3'	6.0'	5.5'
12/17/2014	5.0'	1.3'	3.9'	4.8'	6.0'	4.6'
12/22/2014	3.9'	0.7'	4.9'	4.9'	5.6'	4.6'
1/7/2015	4.2'	1.5'	4.7'	5.0'	5.7'	5.1'
1/13/2015	3.3'	No reading	4.8'	No reading	5.8'	4.9'

*P-2, P-4, P-6 grades have changed. Measurements taken based on original grade.

Table 2B - Summary of Original Stick Up Measurements						
NBC Universal Project 533						
Date	P-1	P-2	P-3	P-4	P-5	P-6
12/10/2014	2.0'	1.5'	1.5'	2.0'	2.0'	2.0'

REFERENCE: "GOOGLE EARTH"

SCALE: 1"=600'

AERIAL MAP

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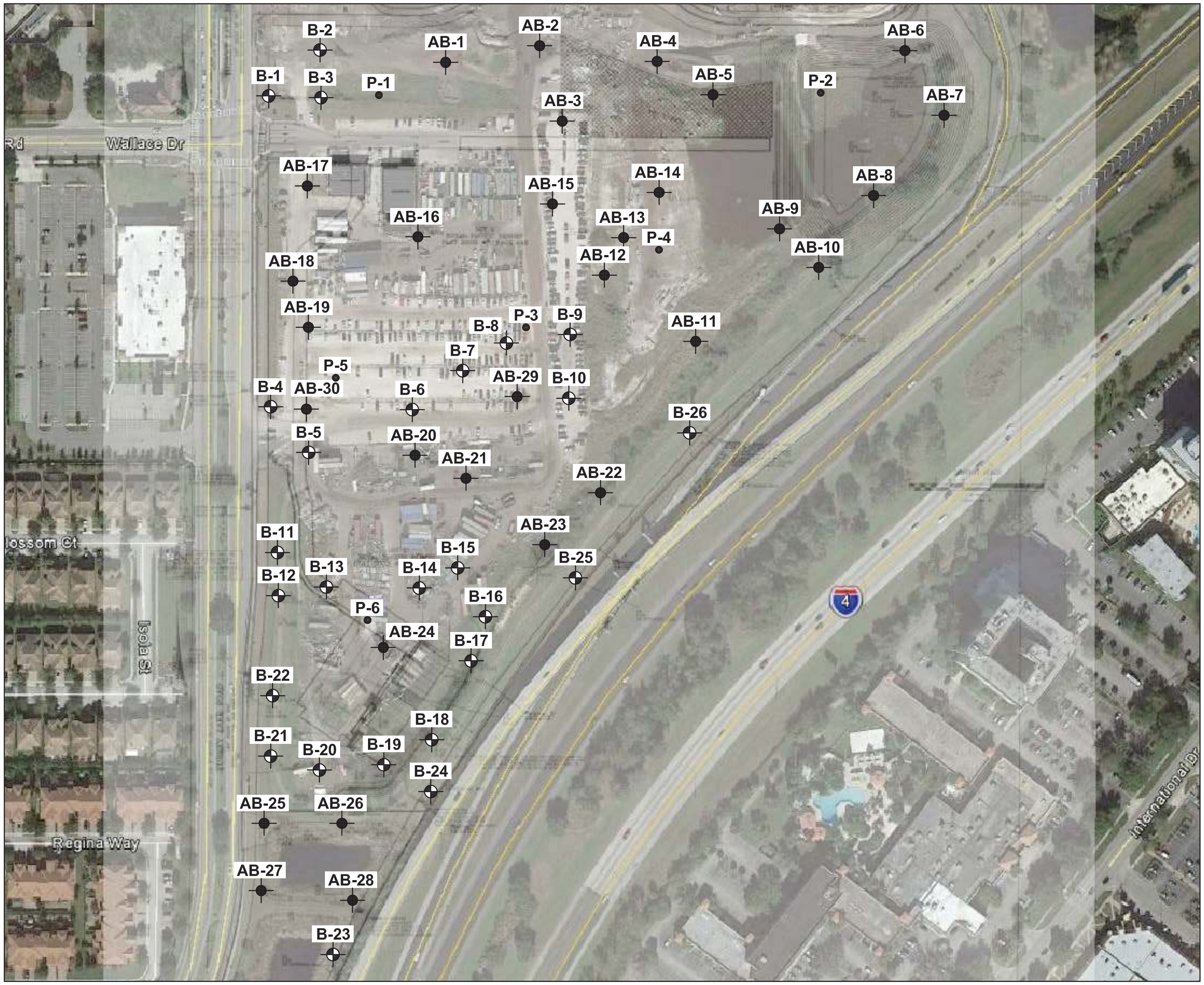
CHKD:	RS	DATE:	12-16-14	FIGURE:	1



LOCATION PLAN

SCALE: 1"=200'

LEGEND

- *APPROXIMATE LOCATION OF STANDARD PENETRATION TEST BORING*
- *APPROXIMATE LOCATION OF AUGER BORING*
- *APPROXIMATE LOCATION OF PIEZOMETER*

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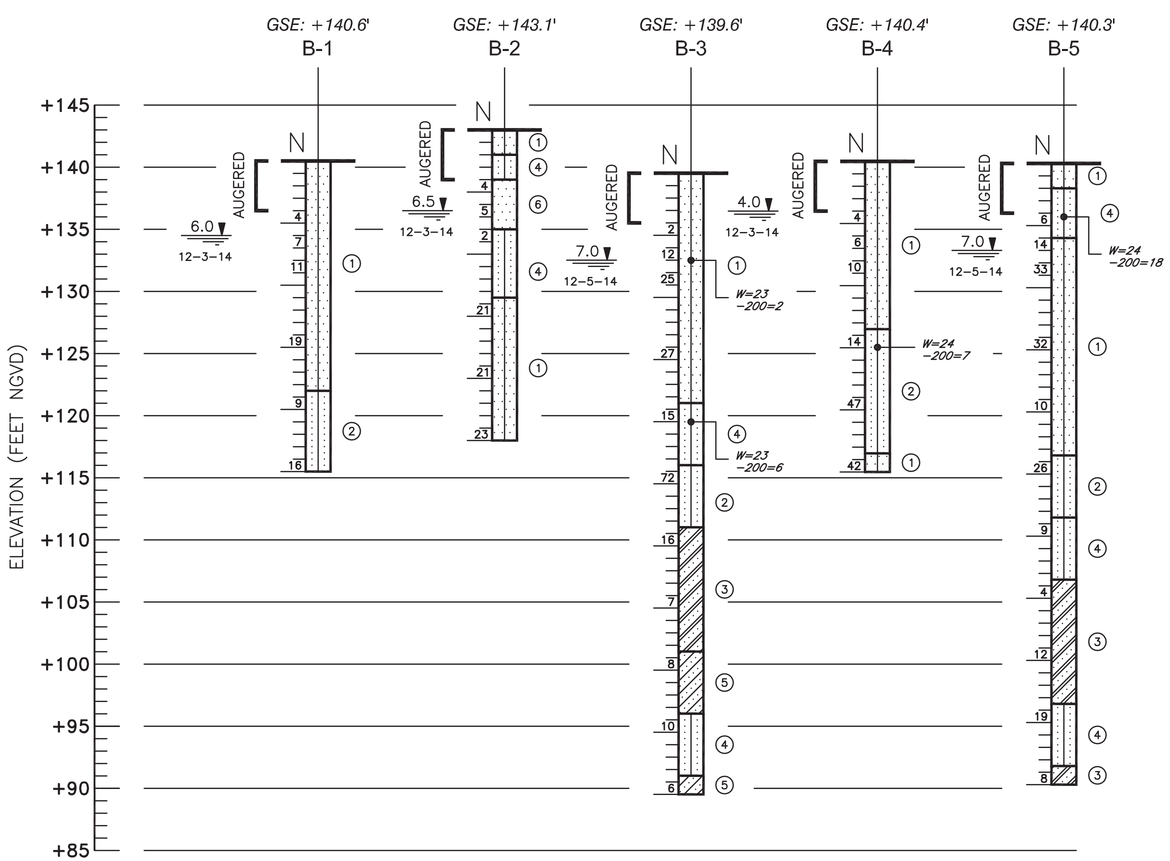

SOIL PROFILES

SCALE: 1"=10'

LEGEND

①	LIGHT GRAY-BROWN TO DARK BROWN FINE SAND TO SLIGHTLY SILTY FINE SAND, (SP), (SP-SM)
②	DARK BROWN SLIGHTLY SILTY FINE SAND TO SILTY FINE SAND WITH HARDPAN, (SP-SM), (SM)
③	GRAY TO GREEN-BROWN SANDY CLAY TO CLAY, (CL), (CH)
④	GREEN-BROWN TO DARK BROWN SLIGHTLY SILTY FINE SAND TO SILTY FINE SAND,(SP-SM), (SM)
⑤	GREEN-BROWN CLAYEY FINE SAND, (SC)
⑥	DARK BROWN ORGANIC FINE SAND, TRACE ROOTS, (SP)
(SP)	UNIFIED SOIL CLASSIFICATION GROUP SYMBOL
N	STANDARD PENETRATION RESISTANCE IN BLOWS PER FOOT USING AN AUTOMATIC HAMMER
6.0 12-3-14	DEPTH TO GROUNDWATER LEVEL IN FEET WITH DATE OF READING
GNE	GROUNDWATER NOT EVIDENT IN UPPER 10 FEET OF BORING
W	NATURAL MOISTURE CONTENT IN PERCENT
-200	FINES PASSING #200 SIEVE IN PERCENT

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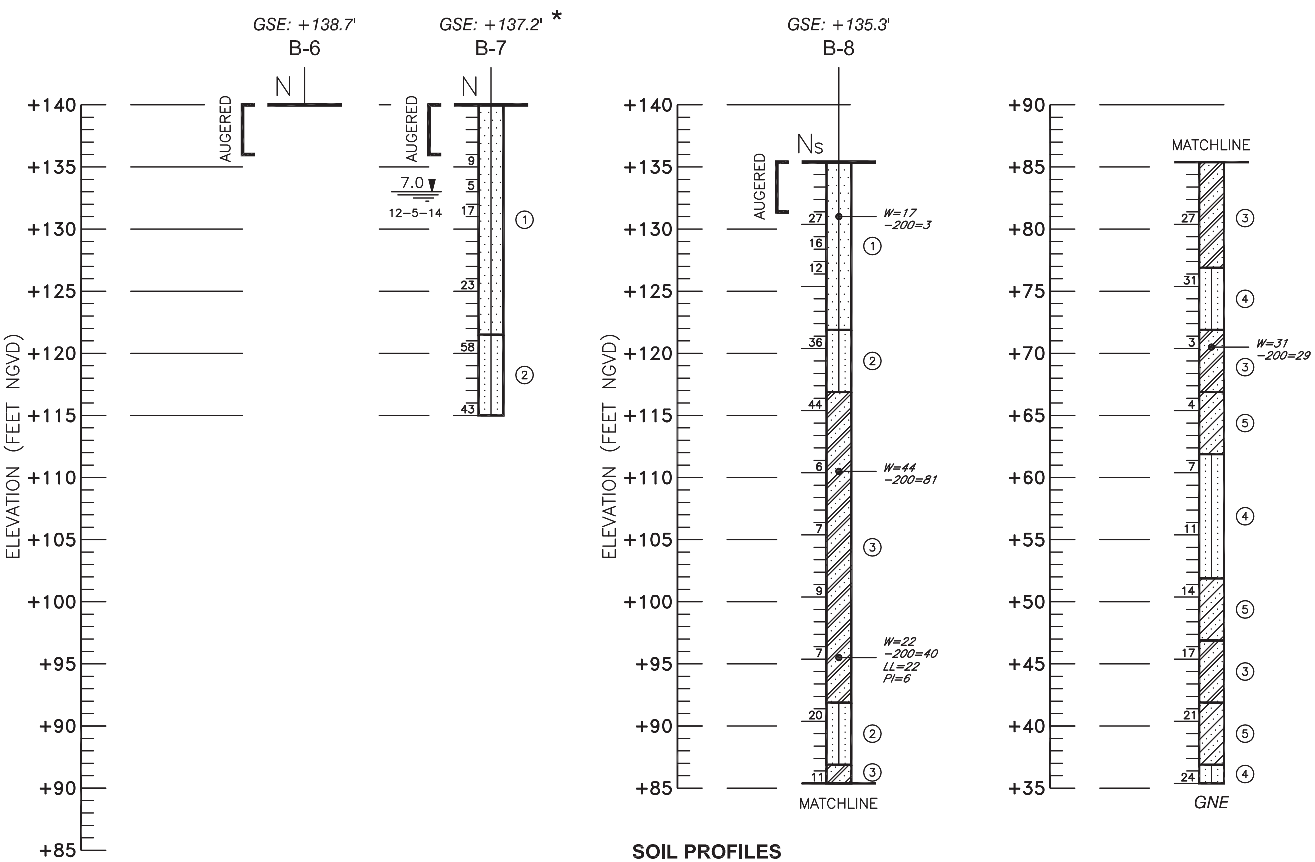

SOIL PROFILES
SCALE: 1"=10'

LEGEND

①	LIGHT GRAY-BROWN TO DARK BROWN FINE SAND TO SLIGHTLY SILTY FINE SAND, (SP), (SP-SM)
②	DARK BROWN SLIGHTLY SILTY FINE SAND TO SILTY FINE SAND WITH HARDPAN, (SP-SM), (SM)
③	GRAY TO GREEN-BROWN SANDY CLAY TO CLAY, (CL), (CH)
④	GREEN-BROWN TO DARK BROWN SLIGHTLY SILTY FINE SAND TO SILTY FINE SAND,(SP-SM), (SM)
⑤	GREEN-BROWN CLAYEY FINE SAND, (SC)
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N	STANDARD PENETRATION RESISTANCE IN BLOWS PER FOOT USING AN AUTOMATIC HAMMER
Ns	STANDARD PENETRATION RESISTANCE IN BLOWS PER FOOT USING A SAFETY HAMMER
6.0 12-3-14	DEPTH TO GROUNDWATER LEVEL IN FEET WITH DATE OF READING
GNE	GROUNDWATER NOT EVIDENT IN UPPER 10 FEET OF BORING
W	NATURAL MOISTURE CONTENT IN PERCENT
-200	FINES PASSING #200 SIEVE IN PERCENT
LL	LIQUID LIMIT IN PERCENT
PI	PLASTICITY INDEX
*	BORING ELEVATION ESTIMATED FROM PROVIDED SITE TOPOGRAPHIC SURVEY DATED 7/11/14

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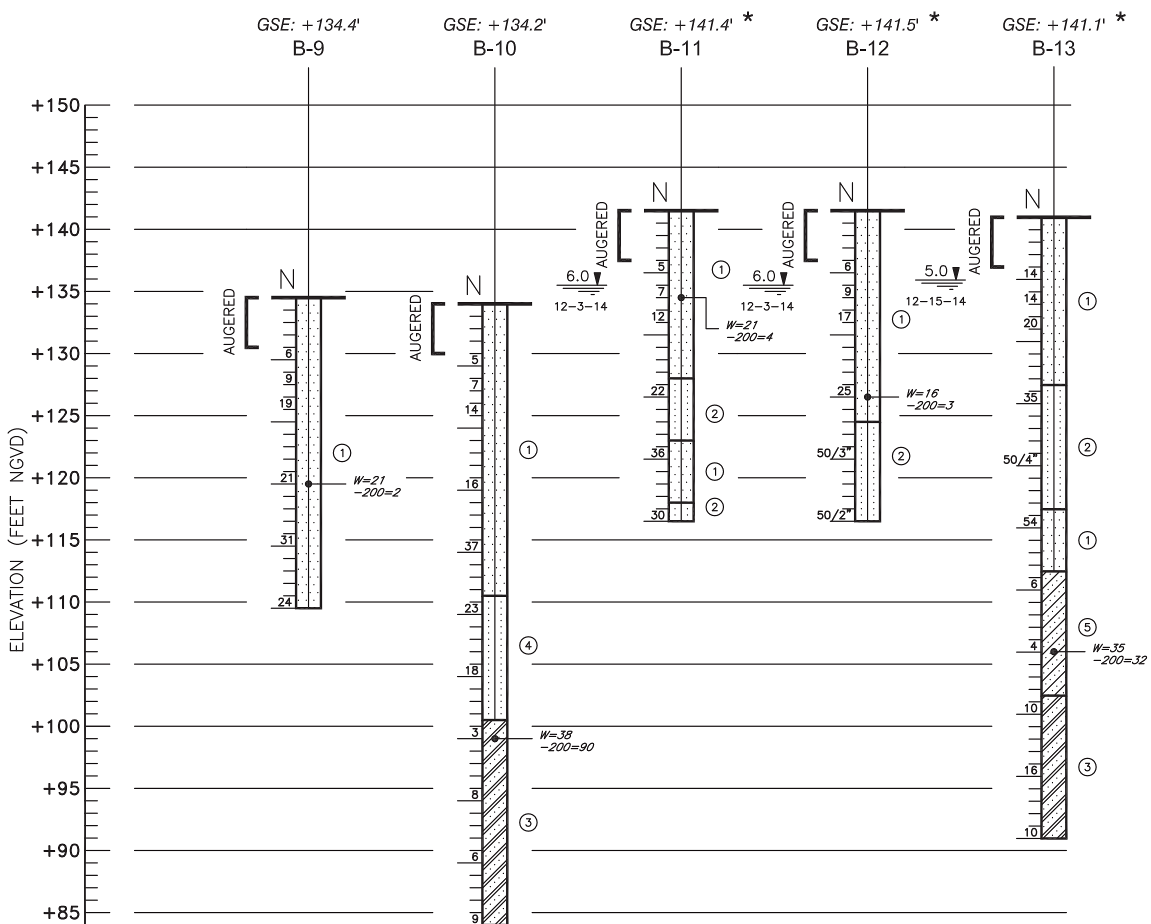

SOIL PROFILES

SCALE: 1"=10'

LEGEND

①	*LIGHT GRAY-BROWN TO DARK BROWN FINE SAND TO SLIGHTLY SILTY FINE SAND, (SP), (SP-SM)*
②	*DARK BROWN SLIGHTLY SILTY FINE SAND TO SILTY FINE SAND WITH HARDPAN, (SP-SM), (SM)*
③	*GRAY TO GREEN-BROWN SANDY CLAY TO CLAY, (CL), (CH)*
④	*GREEN-BROWN TO DARK BROWN SLIGHTLY SILTY FINE SAND TO SILTY FINE SAND,(SP-SM), (SM)*
⑤	*GREEN-BROWN CLAYEY FINE SAND, (SC)*
⑥	*DARK BROWN ORGANIC FINE SAND, TRACE ROOTS, (SP)*
(SP)	*UNIFIED SOIL CLASSIFICATION GROUP SYMBOL*
N	*STANDARD PENETRATION RESISTANCE IN BLOWS PER FOOT USING AN AUTOMATIC HAMMER*
6.0 / 12-3-14	*DEPTH TO GROUNDWATER LEVEL IN FEET WITH DATE OF READING*
GNE	*GROUNDWATER NOT EVIDENT IN UPPER 10 FEET OF BORING*
W	*NATURAL MOISTURE CONTENT IN PERCENT*
-200	*FINES PASSING #200 SIEVE IN PERCENT*
*	*BORING ELEVATION ESTIMATED FROM PROVIDED SITE TOPOGRAPHIC SURVEY DATED 7/11/14*

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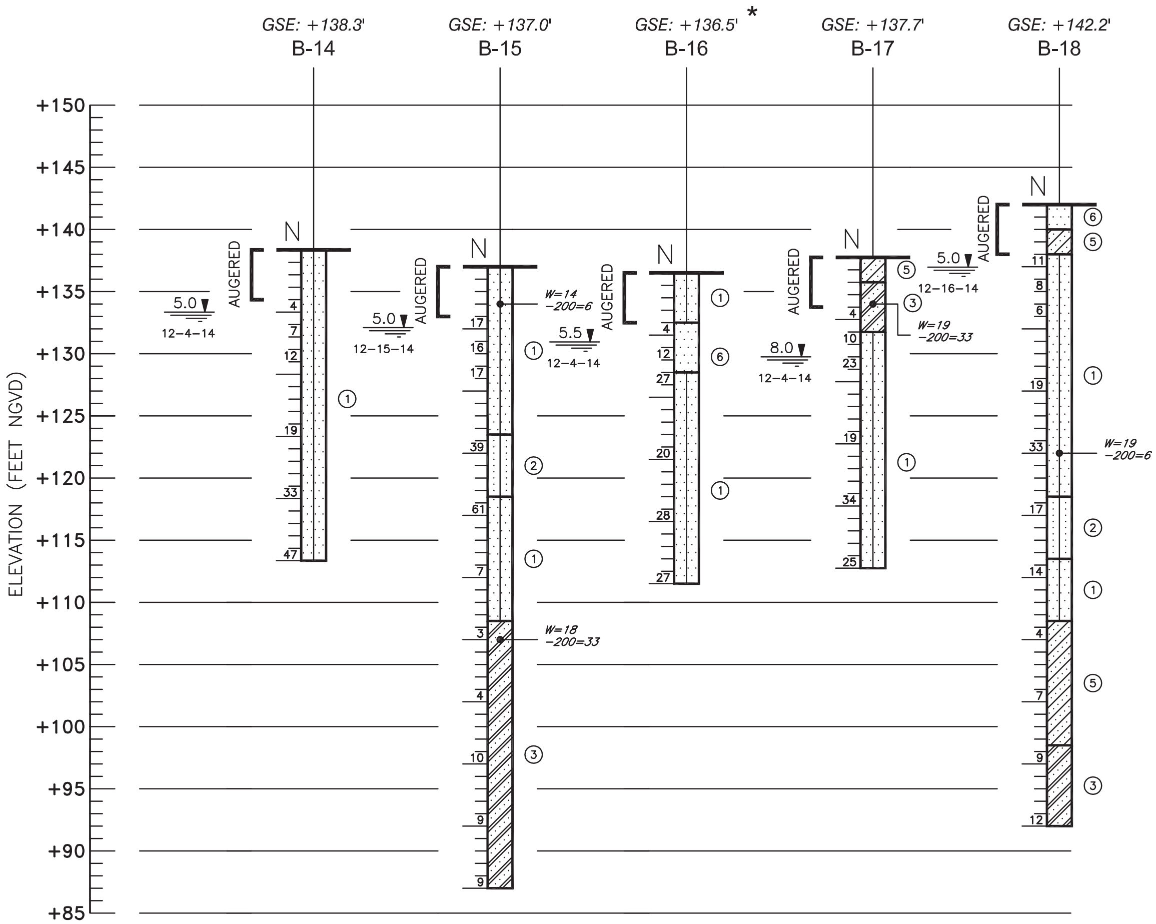

SOIL PROFILES

SCALE: 1"=10'

LEGEND

1. LIGHT GRAY-BROWN TO DARK BROWN FINE SAND TO SLIGHTLY SILTY FINE SAND, (SP), (SP-SM)
2. DARK BROWN SLIGHTLY SILTY FINE SAND TO SILTY FINE SAND WITH HARDPAN, (SP-SM), (SM)
3. GRAY TO GREEN-BROWN SANDY CLAY TO CLAY, (CL), (CH)
4. GREEN-BROWN TO DARK BROWN SLIGHTLY SILTY FINE SAND TO SILTY FINE SAND,(SP-SM), (SM)
5. GREEN-BROWN CLAYEY FINE SAND, (SC)
6. DARK BROWN ORGANIC FINE SAND, TRACE ROOTS, (SP)

(SP) UNIFIED SOIL CLASSIFICATION GROUP SYMBOL

N STANDARD PENETRATION RESISTANCE IN BLOWS PER FOOT USING AN AUTOMATIC HAMMER

6.0 / 12-3-14 DEPTH TO GROUNDWATER LEVEL IN FEET WITH DATE OF READING

W NATURAL MOISTURE CONTENT IN PERCENT

-200 FINES PASSING #200 SIEVE IN PERCENT

* BORING ELEVATION ESTIMATED FROM PROVIDED SITE TOPOGRAPHIC SURVEY DATED 7/11/14

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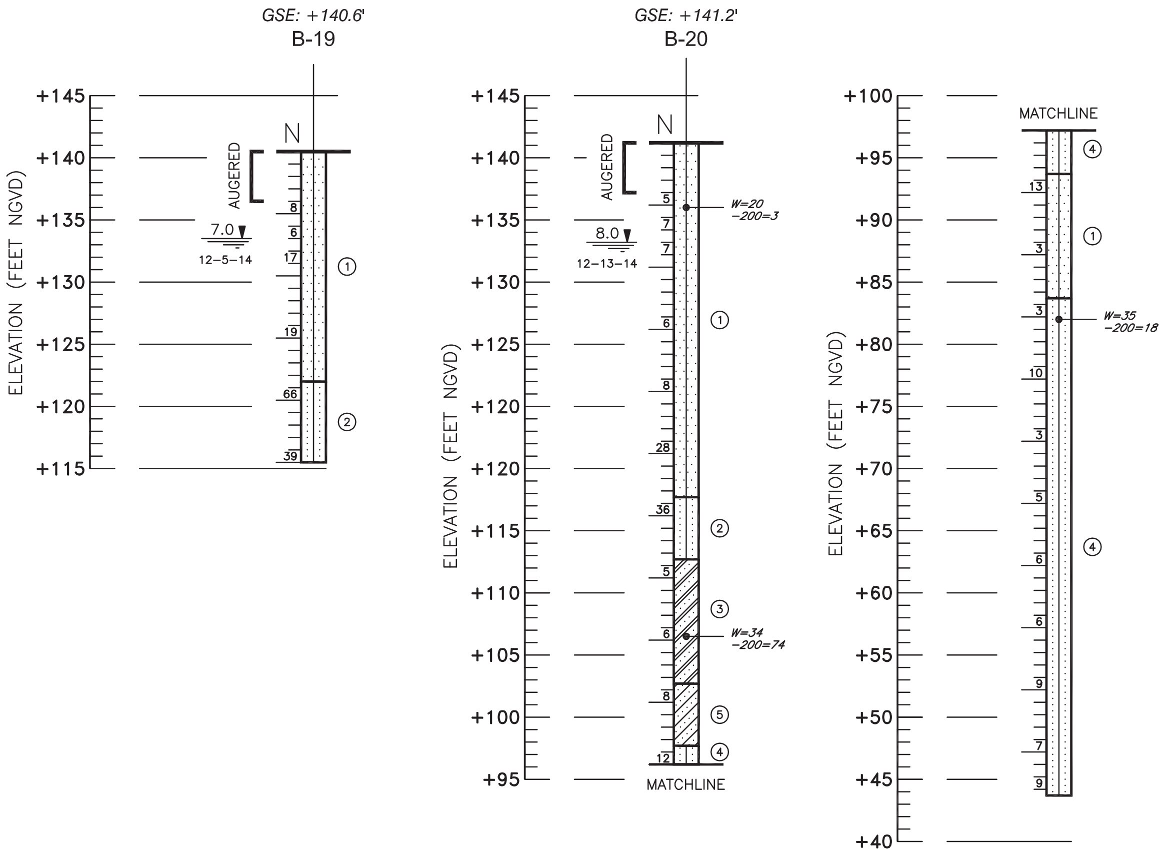

SOIL PROFILES
SCALE: 1"=10'

LEGEND

①	LIGHT GRAY-BROWN TO DARK BROWN FINE SAND TO SLIGHTLY SILTY FINE SAND, (SP), (SP-SM)
②	DARK BROWN SLIGHTLY SILTY FINE SAND TO SILTY FINE SAND WITH HARDPAN, (SP-SM), (SM)
③	GRAY TO GREEN-BROWN SANDY CLAY TO CLAY, (CL), (CH)
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W	NATURAL MOISTURE CONTENT IN PERCENT
-200	FINES PASSING #200 SIEVE IN PERCENT

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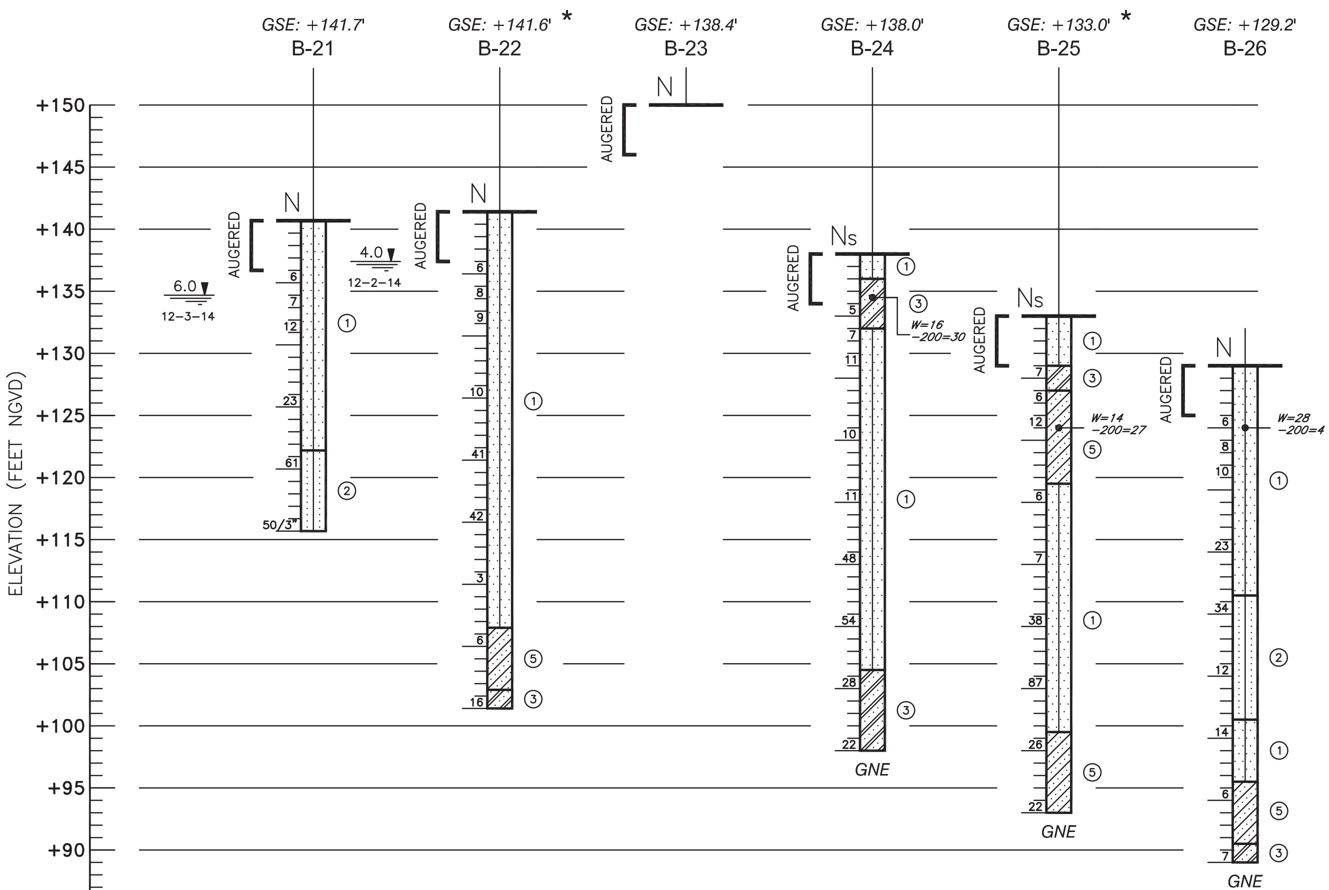
CHKD:	RS	DATE:	12-16-14	SHEET:	6



SOIL PROFILES
SCALE: 1"=10'

LEGEND

① LIGHT GRAY-BROWN TO DARK BROWN FINE SAND TO SLIGHTLY SILTY FINE SAND, (SP), (SP-SM)

② DARK BROWN SLIGHTLY SILTY FINE SAND TO SILTY FINE SAND WITH HARDPAN, (SP-SM), (SM)

③ GRAY TO GREEN-BROWN SANDY CLAY TO CLAY, (CL), (CH)

④ GREEN-BROWN TO DARK BROWN SLIGHTLY SILTY FINE SAND TO SILTY FINE SAND,(SP-SM), (SM)

⑤ GREEN-BROWN CLAYEY FINE SAND, (SC)

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(SP) UNIFIED SOIL CLASSIFICATION GROUP SYMBOL

N STANDARD PENETRATION RESISTANCE IN BLOWS PER FOOT USING AN AUTOMATIC HAMMER

Ns STANDARD PENETRATION RESISTANCE IN BLOWS PER FOOT USING A SAFETY HAMMER

6.0 12-3-14 DEPTH TO GROUNDWATER LEVEL IN FEET WITH DATE OF READING

GNE GROUNDWATER NOT EVIDENT IN UPPER 10 FEET OF BORING

W NATURAL MOISTURE CONTENT IN PERCENT

-200 FINES PASSING #200 SIEVE IN PERCENT

50/3" NUMBER OF BLOWS REQUIRED (50) TO DRIVE SAMPLING SPOON 3 INCHES

* BORING ELEVATION ESTIMATED FROM PROVIDED SITE TOPOGRAPHIC SURVEY DATED 7/11/14

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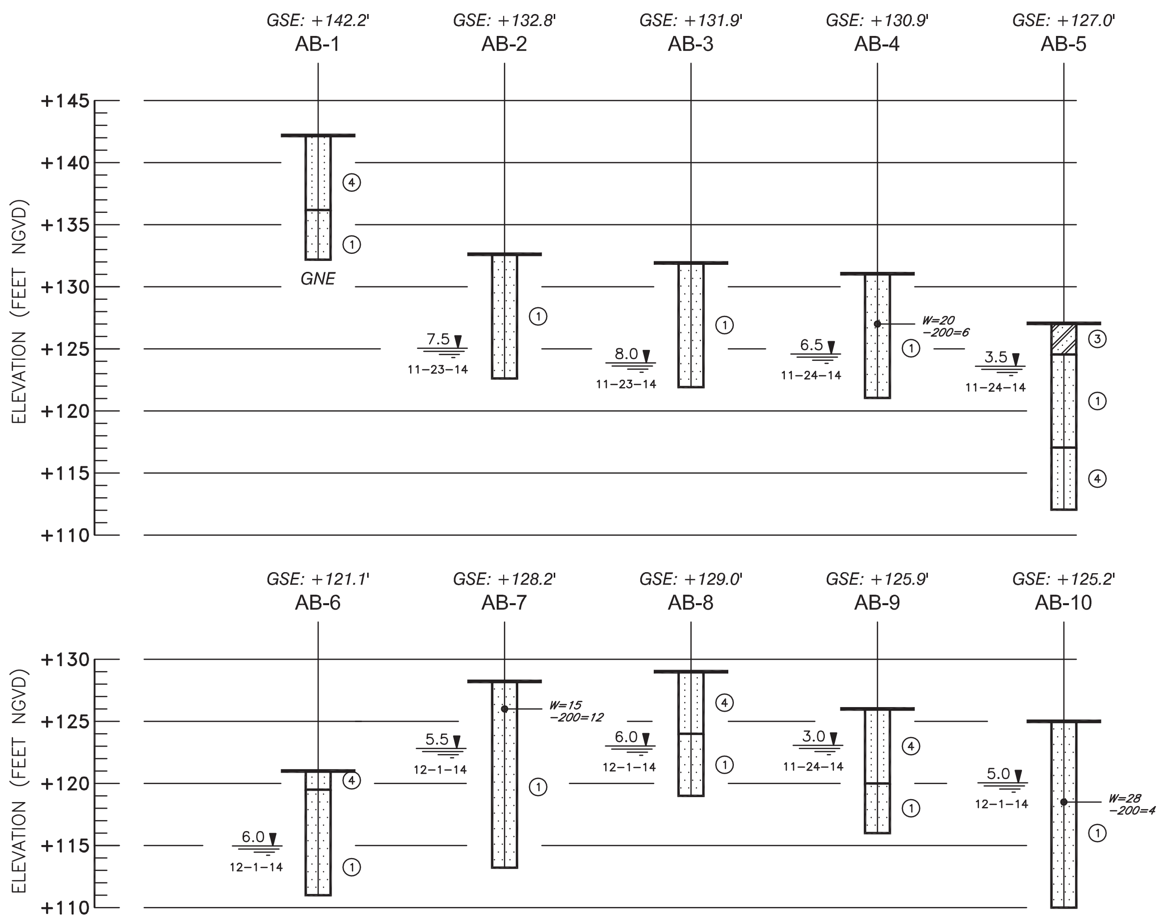

SOIL PROFILES

SCALE: 1"=10'

LEGEND

①	LIGHT GRAY-BROWN TO DARK BROWN FINE SAND TO SLIGHTLY SILTY FINE SAND, (SP), (SP-SM)
②	DARK BROWN SLIGHTLY SILTY FINE SAND TO SILTY FINE SAND WITH HARDPAN, (SP-SM), (SM)
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(SP)	UNIFIED SOIL CLASSIFICATION GROUP SYMBOL
6.0 / 12-3-14	DEPTH TO GROUNDWATER LEVEL IN FEET WITH DATE OF READING
GNE	GROUNDWATER NOT EVIDENT IN UPPER 10 FEET OF BORING
W	NATURAL MOISTURE CONTENT IN PERCENT
-200	FINES PASSING #200 SIEVE IN PERCENT

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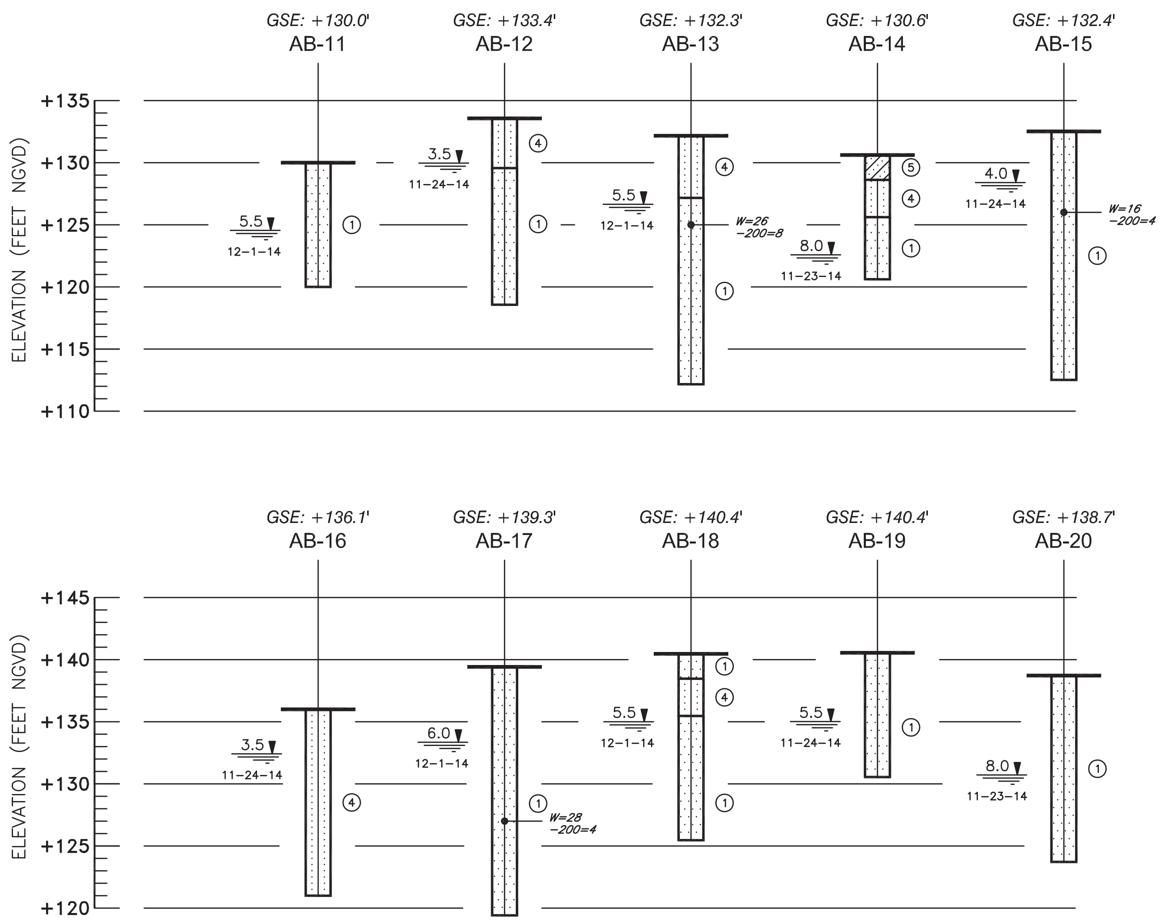
CHKD:	RS	DATE:	12-16-14	SHEET:	8



SOIL PROFILES
SCALE: 1"=10'

LEGEND

1	*LIGHT GRAY-BROWN TO DARK BROWN FINE SAND TO SLIGHTLY SILTY FINE SAND, (SP), (SP-SM)*
2	*DARK BROWN SLIGHTLY SILTY FINE SAND TO SILTY FINE SAND WITH HARDPAN, (SP-SM), (SM)*
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4	*GREEN-BROWN TO DARK BROWN SLIGHTLY SILTY FINE SAND TO SILTY FINE SAND,(SP-SM), (SM)*
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6	*DARK BROWN ORGANIC FINE SAND, TRACE ROOTS, (SP)*
(SP)	*UNIFIED SOIL CLASSIFICATION GROUP SYMBOL*
6.0 12-3-14	*DEPTH TO GROUNDWATER LEVEL IN FEET WITH DATE OF READING*
GNE	*GROUNDWATER NOT EVIDENT IN UPPER 10 FEET OF BORING*
W	*NATURAL MOISTURE CONTENT IN PERCENT*
-200	*FINES PASSING #200 SIEVE IN PERCENT*

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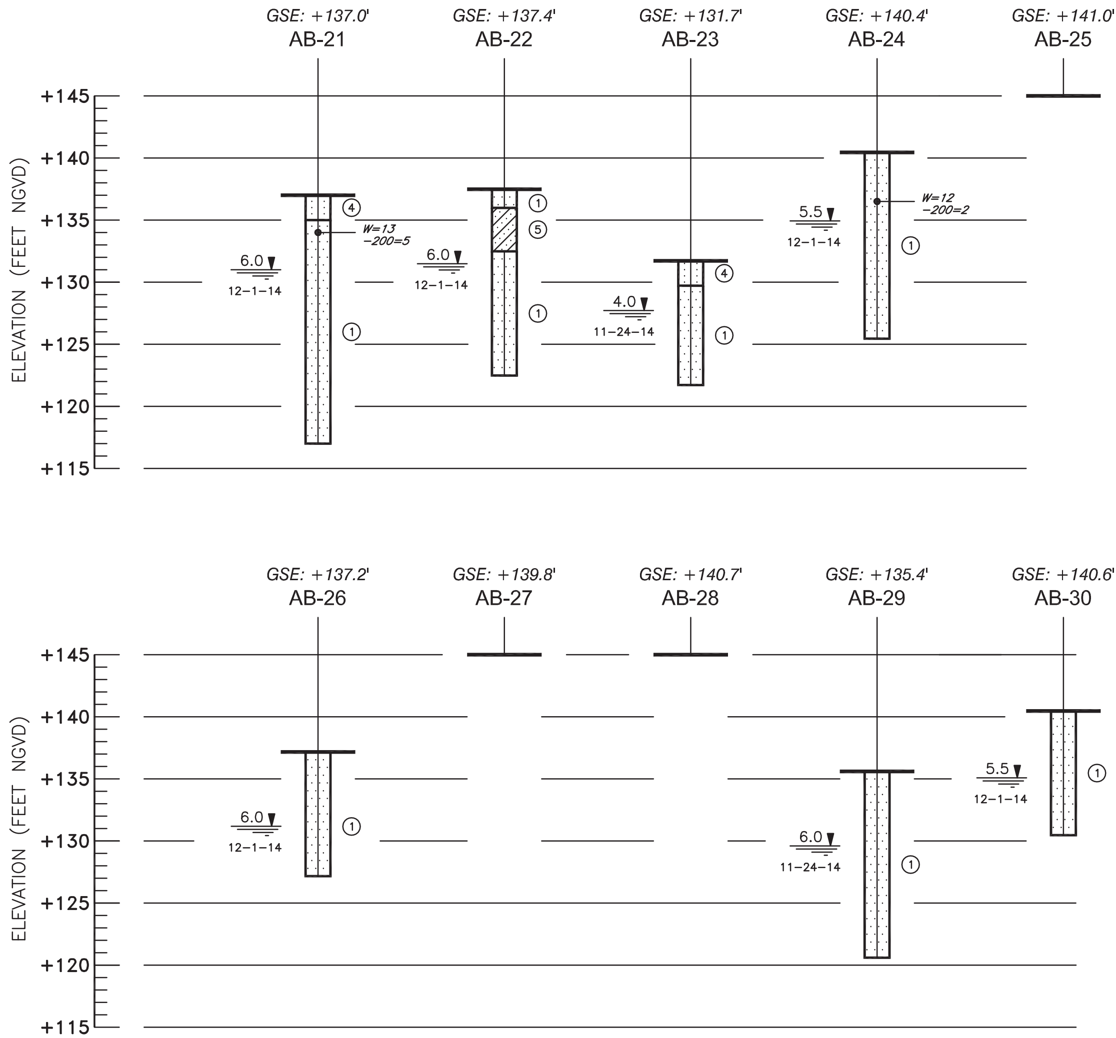
CHKD:	RS	DATE:	12-16-14	SHEET:	9



SOIL PROFILES
SCALE: 1"=10'

LEGEND

①	*LIGHT GRAY-BROWN TO DARK BROWN FINE SAND TO SLIGHTLY SILTY FINE SAND, (SP), (SP-SM)*
②	*DARK BROWN SLIGHTLY SILTY FINE SAND TO SILTY FINE SAND WITH HARDPAN, (SP-SM), (SM)*
③	*GRAY TO GREEN-BROWN SANDY CLAY TO CLAY, (CL), (CH)*
④	*GREEN-BROWN TO DARK BROWN SLIGHTLY SILTY FINE SAND TO SILTY FINE SAND,(SP-SM), (SM)*
⑤	*GREEN-BROWN CLAYEY FINE SAND, (SC)*
⑥	*DARK BROWN ORGANIC FINE SAND, TRACE ROOTS, (SP)*
(SP)	*UNIFIED SOIL CLASSIFICATION GROUP SYMBOL*
6.0 / 12-3-14	*DEPTH TO GROUNDWATER LEVEL IN FEET WITH DATE OF READING*
GNE	*GROUNDWATER NOT EVIDENT IN UPPER 10 FEET OF BORING*
W	*NATURAL MOISTURE CONTENT IN PERCENT*
-200	*FINES PASSING #200 SIEVE IN PERCENT*

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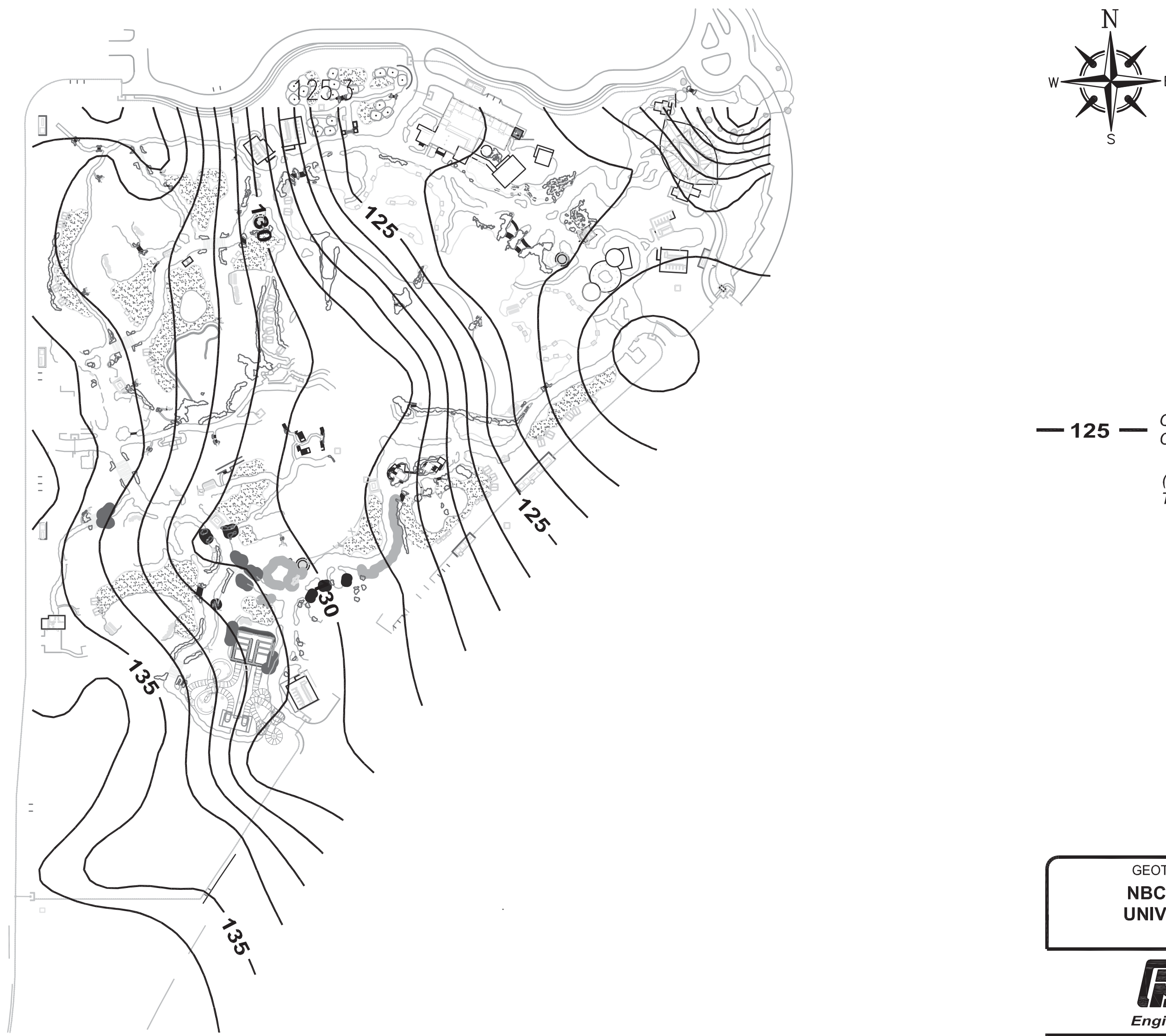
CHKD:	RS	DATE:	12-16-14	SHEET:	10



LOCATION PLAN

SCALE: 1"=200'

LEGEND

— 125 — *OBSERVED GROUNDWATER CONTOUR IN FEET*

(CONTOURS GENERATED USING THE SURFER PROGRAM)

GEOTECHNICAL ENGINEERING SERVICES

NBC UNIVERSAL PROJECT 533

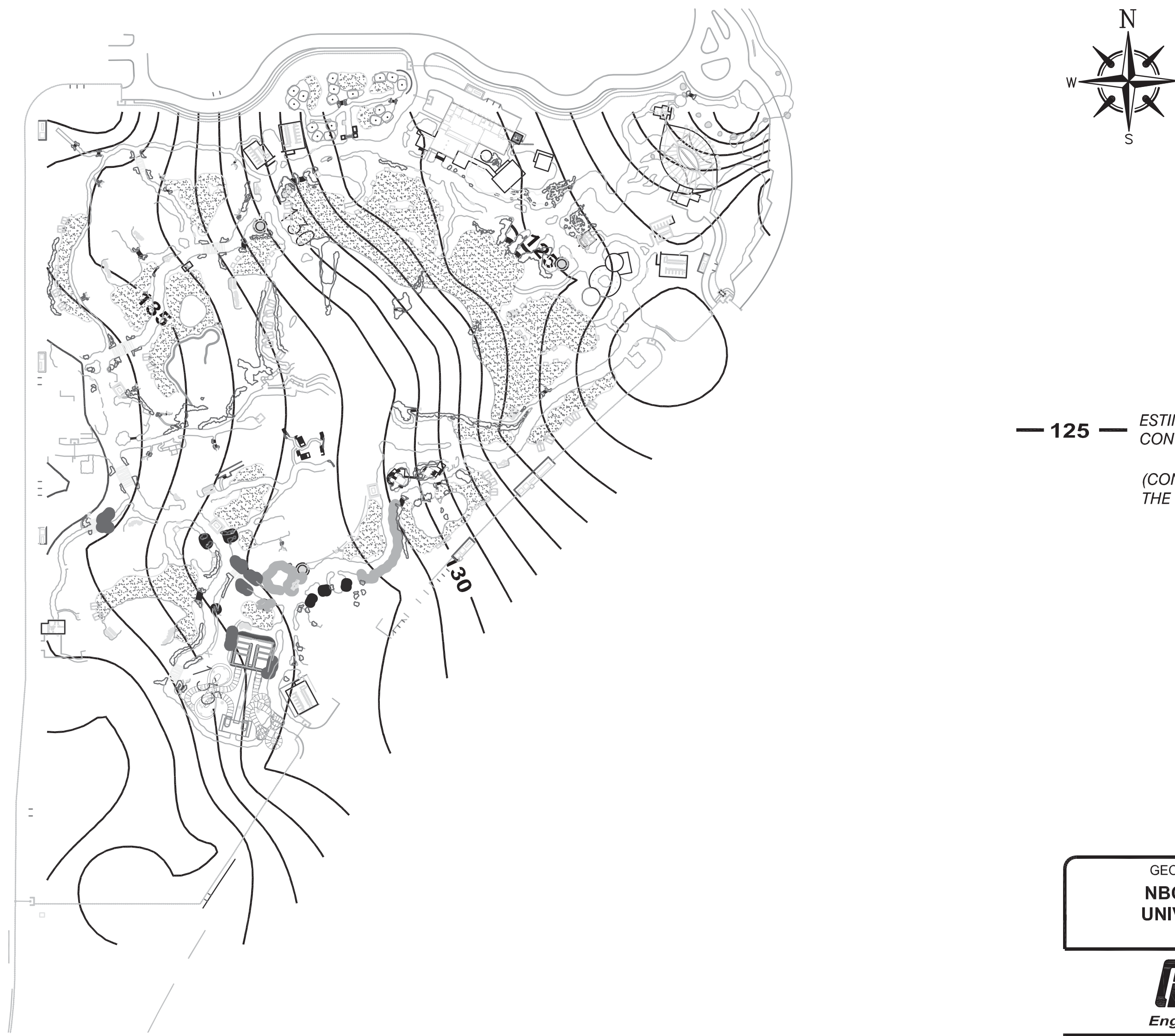
UNIVERSAL RESORT ORLANDO

ORANGE COUNTY, FLORIDA

Information To Build On

Engineering • Consulting • Testing

DRAWN:	DJW	SCALE:	NOTED	PROJ. NO:	07571238
CHKD:	RS	DATE:	12-16-14	SHEET:	11



LOCATION PLAN

SCALE: 1"=200'

LEGEND

— 125 — *ESTIMATED SEASONAL HIGH GROUNDWATER CONTOUR IN FEET*

(CONTOURS GENERATED USING THE SURFER PROGRAM)

GEOTECHNICAL ENGINEERING SERVICES
NBC UNIVERSAL PROJECT 533
UNIVERSAL RESORT ORLANDO
ORANGE COUNTY, FLORIDA

psi Information To Build On
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DRAWN:	DJW	SCALE:	NOTED	PROJ. NO:	07571238
CHKD:	RS	DATE:	12-16-14	SHEET:	12

Appendix D - Permit Basin Areas

Basin G1	Previously Permitted		This Phase	Total Project		
Pavement	13.44	43%	15.78	15.78	51%	acres
Building	0	0%	2.44	2.44	8%	acres
Pond	1.45	5%	0	0	0%	acres
Open Space	16.02	52%	12.69	12.69	41%	acres
Total	30.91		30.91	30.91		

Basin CSF2	Previously Permitted		This Phase	Total Project		
Pavement	4.01	47%	0.04	4.05	48%	acres
Building	1.57	19%	0.63	2.6	31%	acres
Pond	1.03	12%	0	0	0%	acres
Open Space	1.86	22%	2.16	1.82	21%	acres
Total	8.47		2.83	8.47		
			33.74	39.38		

FILE NAME: G:\PROJ\06008049\CIVIL\EXHIBITS\EXHIBIT 1 EXISTING BASIN.DWG
TIME: 04 FEB 2015 - 3:01PM USER: ANTHONYY

PHOTO DATE: 2011
SOURCE: ORANGE COUNTY

EXHIBIT ONE
EXISTING BASIN MAP
BASIN G1 + CSF2 IMPROVEMENTS
ORANGE COUNTY, FL

HARRIS
Harris Civil Engineers, LLC

PHOTO DATE: 2011
SOURCE: ORANGE COUNTY

EXHIBIT TWO
PROPOSED BASIN MAP

BASIN G1 + CSF2 IMPROVEMENTS
ORANGE COUNTY, FL

HARRIS
Harris Civil Engineers, LLC

FILE NAME: G:\PROJ\06008049\CIVIL\EXHIBITS\EXHIBIT 2 PROPOSED BASIN.DWG
TIME: 13 FEB 2015 – 12:45PM USER: ANTHONYY